

Handwritten: 1917, ACB, 2 copies, Dupl.

JAMAICA.

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ANNUAL REPORT

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SUPERINTENDING MEDICAL OFFICER,

Together with the Reports on the following Departments of the Medical Service of the Island, viz:

THE PUBLIC HOSPITAL.

THE LUNATIC ASYLUM

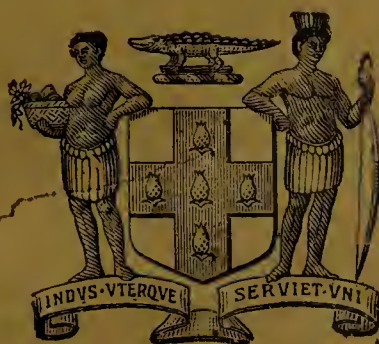
THE LYING-IN HOSPITAL

THE LEPERS' HOME

FOR

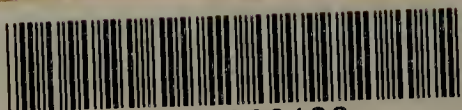
THE YEAR ENDED 31ST MARCH, 1917.

Ordered by His Excellency the Governor to be Printed.



WILLIAM W. WILSON	
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ISLAND MEDICAL DEPARTMENT.

Report for the year ended 31st March, 1917.

Island Medical Office, Kingston, 30th June, 1917.

Sir,

I have the honour to forward for the information of His Excellency the Governor, the accompanying Returns and Reports, including the Annual Report of the Government Bacteriologist, embracing the period for the year which began on 1st April, 1916, and ended on 31st March, 1917.

2. *Acting Appointments*—Dr. E. D. Gideon on the resignation of Dr. G. D. B. Gordon was appointed acting District Medical Officer, Buff Bay, on 24/1/17.

Dr. M. M. Meikle Medical Officer of Health, Manchester on the death of Dr. George Cooke was appointed acting District Medical Officer, Mandeville on 8.1.17, until more satisfactory arrangements could be made.

Dr. F. W. W. Baillie was appointed Acting District Medical Officer of the Mandeville district on 1/4/17.

Dr. S. C. DePass was appointed Dental Surgeon to the Public Hospital as from 1/4/16 for the year unless any unforeseen circumstances should arise.

Dr. G. H. K. Ross, on the death of Dr. C. W. M. Castle, was appointed to act as Senior Medical Officer at the Public Hospital on 15/7/16.

Dr. J. A. Paddyfoot was appointed acting Supernumerary Medical Officer at the Public Hospital on 27.10.16 and left as Medical Officer in charge of the Fifth Jamaica War Contingent on 15/3/17.

Dr. C. A. H. Thomson on Dr. H. Catto's departure for England was left to act as Bacteriologist until Dr. Scott's return.

Dr. J. A. Barnes was appointed Acting Supernumerary Medical Officer at the Public Hospital on 1/6/16., leaving as Second Medical Officer in charge of the Fifth Jamaica War Contingent on 30/3/17.

Dr. O. V. Marsh was appointed to act temporarily and during His Excellency's pleasure as from 31/3/17 as Supernumerary Medical Officer, at the Public Hospital, Kingston.

Miss M. Brooks on the resignation of Miss T. M. Whittingham from the Public Hospital, Kingston, was appointed to act as Matron as from 1/9/16.

3. *Resignations.*—Dr. G. D. B. Gordon resigned his appointment as Acting District Medical Officer, Buff Bay, on 23/1/17.

Dr. H. Catto resigned his appointment as Assistant Government Bacteriologist on 27.1.17 and Dr. H. H. Scott was recalled from War service in consequence.

Dr. A. A. Anderson resigned his appointment as Acting Supernumerary Medical Officer, Public Hospital, to take up duty with the Contingent on 3/1/17.

Miss T. M. Whittingham resigned her appointment as Matron to the Public Hospital on 31/8/16.

4. *Deaths.*—I regret to report the death of Dr. George Cooke, late District Medical Officer, Mandeville, on 7/1/17, and also of Dr. C. W. M. Castle, late Senior Medical Officer at the Public Hospital on 15/7/16.

5. *Leave of Absence.*—The following Officers were granted leave of absence:—

Name.	Period of Absence.	Period during which absent.	Acting Officer.
Dr. J. E. Ker, S.M.O.	10 days	10.10.16-19.10.16	Dr. L. Gifford
Mr. M. C. Solomon (1st Class Clerk)	7 months	5.6.16-8.1.17	Mr. B. M. Clark
Mr. C. Don, Medical Store-keeper & Secy. Quarantine Board	3 months and 17 days	18.6.16-5.10.16	Mr. H. A. Hamilton and Mr. M. J. Thomas
Dr. A. A. Anderson	10 days	2.6.16-11.6.16	Dr. C. A. H. Thomson
Dr. W. A. S. Browne	1 month & 7 days	26.5.16-2.7.16	Dr. J. B. St. Cyr
Dr. Geo. Cooke	14 days	17.8.16-30.8.16	Dr. M. M. Meikle
Dr. J. A. L. Calder	7 days	14.8.16-20.8.16	Dr. E. R. Harriott
Dr. H. Catto	3 months	26.10.16-26.1.17	Dr. C. A. H. Thomson
Dr. G. E. Cheyne	2 months	17.11.16-15.1.17	Dr. C. M. Ormsby
Dr. Lewis Crooks	4 weeks	7.2.17-6.3.17	Dr. R. H. Davidson
Dr. S. C. DePass	3 weeks	18.1.17-8.2.17	Dr. E. C. Melville
Dr. E. R. C. Earle	5 weeks	2.9.16-7.10.16	Dr. T. R. Matthews
Dr. H. G. Johnston	12 months	1.4.16-31.3.17	Dr. A. M. Mills
Dr. G. I. Lecesne	3 weeks	24.7.16-13.8.16	Dr. R. O. Williams
Dr. J. H. Peck	16 days	1.9.16-16.9.16	Dr. A. E. Mayner
Dr. R. G. Sherlock	2 weeks	23.12.16-6.1.17	Dr. Noel Sandford
Dr. H. T. Strudwick	16 days	1.1.17-16.1.17	Dr. A. W. Thomson
Dr. A. W. Thomson	6 months	17.7.16-16.1.17	Dr. H. T. Strudwick
Mr. R. A. N. Gordon	16 days	12.1.17-27.1.17	Mr. H. A. Hamilton
Miss Stella Bridge	7 weeks	5.2.17-28.3.17	Miss Z. Sandford
Miss E. M. Thomson	4 months	16.7.16-15.11.16	Miss E. McNeil Smith
Miss T. M. Whittingham	3½ months	8.5.16-31.8.16	Miss M. Brooks
Miss G. A. Sparkes	5 weeks	2.8.16-6.9.16	Divided among staff

6. *Shortages of Permanent Medical Officers.*—At the time of writing there are no less than 14 of the Staff of this department engaged on War work.

Two of them are employed at Camp either in connection with the R.A.M.C. or with the Contingent Camp and 12 are in Europe, Asia or Africa doing Military work of one sort or another.

There are three vacancies due to deaths in the Department (Buff Bay, Mandeville, Public Hospital, Kingston.)

There are three vacancies due to resignations (Manchioneal, Black River, Assistant Pathologist.)

There is one vacancy due to transfer (Gordon Town).

Consequently there are 21 shortages in the Department due to Medical Officers being away from duty at this moment. Naturally this is a great handicap to the Department but from an Imperial point of view it is only right that a certain amount of inconvenience should be put up with by this colony, and a certain amount of risk taken by myself in order that the Army may be supplied with much needed Medical Officers.

It may be here stated that in addition to the above, three Medical Officers, not so far permanently connected with the Department, have been found to take charge of various Contingents that have left the Island and these have stayed abroad with them.

Others have had to be found for work at Camp.

7. Return of Expenditure of Island Medical Department, 1916-17.

	Personal Emoluments.	Other Charges.	Gross Expenditure.	Amount of Dues Collected.	Actual Ex- penditure after deducting amount passed to credit of Hospital.	Amounts of Grants Estimated.
	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.
Head Office ..	2,671 17 7	6,826 14 6	9,498 12 1	2,605 16 4	6,892 15 9	8,424 15 5
District Medical Officers ..	5,640 8 11	..	5,640 8 11	..	5,640 8 11	5,750 0 0
Supernumerary Medical Officers ..	199 9 3	..	199 9 3	..	199 9 3	200 0 0
Temporary Out-stations and Dispensary appointments ..	145 16 8	..	145 16 8	..	145 16 8	150 0 0
Public General Hospitals—						
Morant Bay ..	212 4 5	224 12 4	436 16 9	5 11 10	431 4 11	501 2 3
Hordley ..	308 15 0	633 16 9	942 11 9	14 14 4	927 17 5	983 12 0
Port Antonio ..	518 6 0	1,360 7 1	1,878 13 1	23 7 5	1,855 5 8	1,982 16 0
Buff Bay ..	604 8 0	1,829 12 10	2,434 0 10	15 14 8	2,418 6 2	2,964 19 0
Annotto Bay ..	469 9 10	1,368 10 9	1,838 0 7	16 11 6	1,821 9 1	1,984 9 6
Port Maria ..	446 18 6	861 4 9	1,308 3 3	30 9 8	1,277 13 7	1,522 3 6
St. Ann's Bay ..	237 9 10	231 16 10	469 6 8	4 13 8	464 13 0	532 10 6
Cave Valley ..	75 6 0	110 0 0	185 6 0	12 0 0	173 6 0	200 18 0
Falmouth ..	208 5 0	194 2 3	402 7 3	3 7 0	399 0 3	424 8 0
Ulster Spring ..	93 16 9	82 12 8	176 9 5	2 7 6	174 1 11	190 15 0
Montego Bay ..	278 7 9	479 13 3	758 1 0	4 1 6	753 19 6	960 11 0
Lucea ..	237 19 2	225 7 3	463 6 5	4 15 0	458 11 5	474 18 2
Sav.-la-Mar ..	547 12 8	1,531 3 11	2,078 16 7	57 7 6	2,021 9 1	2,225 8 6
Black River ..	240 0 2	310 5 6	550 5 8	41 5 7	509 0 1	543 17 6
Mandeville ..	235 0 10	369 3 2	604 4 0	6 16 0	597 8 0	589 12 6
Chapelton ..	306 14 2	418 9 9	725 3 11	2 14 2	722 9 9	744 11 0
Lionel Town ..	391 8 1	864 0 11	1,255 9 0	4 5 6	1,251 3 6	1,541 18 10
Spanish Town ..	434 10 0	1,009 1 10	1,443 11 10	10 3 10	1,433 8 0	1,428 0 0
Linstead ..	244 14 4	348 5 2	592 19 6	9 9 2	583 10 4	587 17 4
Yaws Fees ..	899 18 8	317 16 10	1,217 15 6	..	1,217 15 6	1,000 0 0
Investigation of Vomiting Sickness ..	..	4 4 0	4 4 0	..	4 4 0	50 0 0
Drugs and Poisons Law ..	13 2 0	..	13 2 0	..	13 2 0	17 0 0
Medical Attendance on Immi- grants ..	616 9 5	..	616 9 5	..	616 9 5	961 4 0
Public Hospital ..	5,236 15 0	6,094 2 3	11,330 17 3	1,327 13 1	10,003 4 2	11,451 5 7
Lunatic Asylum ..	7,315 5 9	16,472 6 7	23,787 12 4	11,249 13 2	12,537 19 2	24,184 15 7
Lepers' Home ..	959 17 1	1,638 7 7	2,598 4 8	..	2,598 4 8	2,730 0 0
Victoria Jubilee Hospital ..	601 7 0	616 18 6	1,218 5 6	569 9 9	648 15 9	1,378 2 3
Vaccination Fees ..	1,703 13 9	..	1,703 13 9	..	1,703 13 9	1,500 0 0
Medical Officer, General Peni- tentiary ..	229 11 8	..	229 11 8	..	229 11 8	250 0 0
Health Officer, Port Royal ..	450 0 0	..	450 0 0	..	450 0 0	450 0 0
Quarantine ..	269 4 0	375 8 7	644 12 7	85 1 0	559 11 7	913 15 8
Central Board of Health ..	..	20 17 2	20 17 2	..	20 17 2	25 0 0
Medical Council ..	2 2 0	..	2 2 0	..	2 2 0	20 0 0
Venereal Diseases ..	132 5 6	526 0 1	658 5 7	..	658 5 7	..
	33,178 10 9	45,345 3 1	78,523 13 10	16,107 9 2	62,416 4 8	79,840 7 1

8. Return shewing the daily cost per patient and the daily cost per patient for maintenance only at the several Public General Hospitals.

Hospitals.	Daily total cost patient excluding D.M.O's. salary.		Daily cost per patient for maintenance only.
	s.	d.	d.
Morant Bay	1	3	5½
Hordley	0	11¾	6¼
Port Antonio	1	0¼	6½
Buff Bay	1	1¼	7¾
Annotto Bay	0	9½	5½
Port Maria	1	1¾	6¼
St. Ann's Bay	1	7¼	6½
Cave Valley	1	8¼	6
Falmouth	1	7	6¾
Ulster Spring	1	11¼	7¼
Montego Bay	1	1¾	6¾
Lucea	1	4	5½
Sav.-la-Mar	0	11¾	6½
Black River	1	7	7
Mandeville	1	3¼	6¼
Chapelton	1	4	6½
Lionel Town	1	3¼	7½
Spanish Town	0	10¾	5½
Linstead	1	3½	6½

9. *Drugs*.—Owing to the war the price of many drugs has increased enormously.

The Department has been kept on short commons during the year under review and one may reasonably wonder whether the patients have suffered or not in consequence.

Receipts for Drugs.—The value of drugs given out from the Medical Store during the year was £2,576 6s. 8½d.

The amount spent on drugs during the year was £6,181 3s. 8d.

The receipts from the sale of drugs to Parochial Boards, the contingent, the prisons, etc., amounted to £2,314 2s. 3½d, which sum was paid into General Revenue.

It is very evident that a large return in cash is received from the drug vote. The contingent alone paid £127 13s. 4d. for drugs.

It will thus be seen that the output of drugs during the year greatly exceeded the amount received. The Government has had this fact brought to their notice as it cannot go on any longer. I have frequently had to refuse drugs even for use of the contingent simply because I had not got them in stock.

I maintain that the Island Medical Store should never have less than 6 months stock of drugs in hand.

Drugs have come very irregularly from England and the store has often been almost empty.

Attached please find the price of certain drugs before the war and at present.

Articles.		Before the war.			At present.		
		£	s.	d.	£	s.	d.
Acid Boric	per cwt.	1	11	0	3	9	6
Potas Iodid	per lb.	0	11	4	0	14	6
Iodoform	"	0	16	0	1	0	0
Quinine Sulph.	"	0	16	8	1	16	8
Chloroform	"	0	6	0	0	7	3
Potass Bromid	"	0	1	8½	0	6	9
Alcohol Absolute	"	0	0	10	0	2	4
Quinine Tablets	"	0	16	0	2	10	0
Thymol	"	0	7	5	2	0	0
Sulphonol	"	0	9	0	1	3	6
Phenacetin	"	0	3	2	0	19	0
Salol	"	0	2	4	0	12	0
Tr. Chlorof et Morph Co.	"	0	2	4½	0	4	6
Antipyrin	"	0	8	2	2	5	4
Ichthyol	"	0	3	0	0	7	0
Beta Naphthol	"	0	4	0	0	6	0
Potass Permang.	"	0	1	6	0	16	6
Santonin	"	5	5	6	8	16	0
Sodii Salicyles	"	0	2	2	0	5	10
Aspirin	"	0	8	0	1	5	6
Bismuth Subnit	"	0	7	5	0	11	0
Hydrarg Subchlor	"	0	2	10	0	7	3
Hydrarg Perchlor	"	0	2	7	0	6	8½

Value of drugs, etc., issued to the various Institutions, etc., from the Island Medical Stores during the financial year, 1916-17.

	£	s.	d.
Value of drugs and sundries issued to the Public General Hospitals, Lepers Home and Medical Districts	3,666	12	1
“ Stimulants issued to Public General Hospitals and Lepers Home	56	9	9
“ Drugs, etc., issued to Kingston Public Hospital	1,362	0	10
“ Drugs, etc., issued to Jubilee Hospital	46	5	7
“ Stimulants issued to Jubilee Hospital	0	16	9
“ Drugs, etc., issued to Lunatic Asylum	616	9	11
“ Stimulants issued to Lunatic Asylum	10	4	5
“ Drugs, etc., to Prison and Reformatories	220	3	2
“ Stimulants issued to Prisons and Reformatories	13	11	7
“ Drugs issued to Department of Agriculture	3	16	0
“ Drugs issued to Quarantine Station and Visiting Officers	21	5	2
“ Drugs issued to Parochial Boards	850	2	1
“ Stimulants issued to Par. Boards	84	3	8
“ Drugs, etc., issued to Constabulary	108	9	7
“ Quinine in packets supplied to Post Offices, etc.	403	6	8
“ Drugs and sundries sold	117	5	1
“ Lymph issued to District Medical Officers	355	12	8
“ Quinine issued to Estates	148	13	9
“ Drugs, etc., issued to Jamaica War Contingent	348	11	6
“ Drugs issued to Schools Department	5	12	0
	8,439	12	3

10. During the year there were 2 general examinations under Law 34 of 1894 at which 25 candidates presented themselves, including one from the Kingston Public Hospital. 14 candidates satisfied the examiners including one from the Kingston Public Hospital, and were granted licenses.

11. Return shewing the number of cases prosecuted at the instance of the Constabulary for violation of Law 34 of 1894—The Drugs and Poisons Law during the year ended 31st March, 1917.

Parish.	Title of Case.	Nature of Offence.	Date of trial.	Result.
Kingston	Rex vs. D. Henderson	Selling Drugs and Poisons without qualification.	24.11.16	Acquitted
	E. Lester	Not making proper entries of Sales	11.8.16	Admonished and discharged
Saint Mary	Alice Black	Selling Drugs without License	8.3.17	Reprimanded and discharged.

12. *Vaccination.*—The following are the results of the last seven years including the year under review.

Year.	Success-ful.	Not suc-cessful.	Did not return.	D.M.O.	Constables.	Registrars.	Totals.
				£ s. d.	£ s. d.	£ s. d.	£ s. d.
1910-11	23,106	617	559	993 5 0	259 1 3	246 17 5	1,499 2 7
1911-12	19,784	2,933	663	757 7 0	215 10 5	251 17 5	1,224 14 10
1912-13	26,103	393	343	649 14 8	1,034 3 6	248 6 11	1,932 5 1
1913-14	29,219	1,207	591	1,390 5 0	370 5 6	216 8 10	1,976 19 4
1914-15	21,575	1,249	549	1,183 11 0	322 15 2	212 9 6	1,718 15 8
1915-16	23,391	701	661	1,001 5 0	266 0 9	280 8 5	1,547 14 2
1916-17	25,482	1,306	787	1,142 19 0	303 5 2	257 9 7	1,703 13 9

The payments made are as follows:—

One shilling for each successful case to the D.M.O. Three-pence for every successful case brought out by the District constable. Twopence to the Registrar for every birth notified.

The above is the return for the last and some previous years.

The children of the Island are protected against small pox, but very little re-vaccination takes place, consequently one may say that the adult population are very poorly protected if at all.

Annotto Bay.—Yaws exists in overwhelming numbers in this medical district chiefly in the Fort George, Long Road, Epsom, Enfield and Castleton Districts. Many of them have been treated with good results but the exact information as to actual numbers is not to hand.

The number treated in the Hospital was creoles 9 and coolies 9, and all so treated have been cleaned up but recurrence may take place though none as yet. A few photographs have been made of a prominent and well marked case both before and after treatment showing the contrasts. Copies of these are here for exhibition.

Adelphi.—Yaws is very prevalent and is confined to no particular locality but is general throughout. As the treatment by Salvarsan is the only efficient way of dealing with the disease those so affected were generally referred to the Montego Bay Hospital for treatment. On one occasion 20 doses were obtained from the D.M.O. of that Institution and that number of cases was injected at the Adelphi Police Station. All of them on subsequent inspection showed marked improvement.

Buff Bay.—Yaws prevalent. More cripples from Yaws are to be found throughout the district than from any other condition. 247 have been cured by injections of Salvarsan in one or other of its many forms of preparation.

Balaclava.—Yaws exists in practically every part of the district.

Black River.—Yaws not prevalent.

Cave Valley.—Yaws is prevalent throughout the district, particularly towards the Clarendon border of the parish. Over 100 cases have been treated with Salvarsan. All recovered.

Claremont.—Not prevalent.

Chapelton.—Still exists in the district and cases occur everywhere. 479 cases were treated and presumably 450 were relieved the rest continuing treatment.

Crofts Hill.—Yaws is prevalent in the district, especially around Point Hill and Top Hill.

Duncans.—Under the salvarsan treatment Yaws is being controlled to a great extent. It exists everywhere chiefly in Duan Vale and Stewart Town. 101 cases were successfully treated.

Falmouth.—Yaws prevalent especially at Sherwood, Deeside, Friendship, Bunkers Hill and York. 101 cases treated by Arsenobillon in the districts of Sherwood and Deeside of these all the symptoms disappeared and 6 as Hospital Outpatients who did not return to record their cure also 3 as inpatients—one discharged as cured and 2 requested their discharge before a cure could be noted.

Gordon Town.—Yaws is very prevalent and is on the increase especially among children. 51 cases were treated in one locality during the December quarter with salvarsan preparations. All with cure of symptoms, no recurrence.

Gayle.—Yaws abounds throughout the entire district. 51 cases treated with Kharsivan. All were cured of symptoms.

Grange Hill.—Very few cases of Yaws. They do not return for treatment and are never cured.

Hagley Gap.—Yaws is very prevalent throughout the district. None have been treated.

Hordley.—Yaws is still prevalent. It is not confined to any particular district. 191 cases were treated with the Salvarsan preparations. Of these 186 were cured 138 were treated at the hospital with Mercury and Iodide in connection with outpatient department but the D.M.O. is unable to say how many were cured as very few reported afterwards.

Lower St. Andrew.—Yaws is not nearly so prevalent as in the hilly districts. The D.M.O. was unable to get half the number of cases which he had authority to treat with Salvarsan preparations.

Lucea.—Yaws was prevalent in the outlying villages. 193 cases have been treated with salvarsan (30 in hospital) 174 cases have had symptoms cured.

Little London.—Yaws is very prevalent in all parts of the district. No cases have been treated.

Lionel Town.—Yaws has not been met with.

Linstead.—Yaws is still very prevalent especially in the Above Rocks, Redwood, Harkers Hall and West Prospect districts.

Morant Bay.—Yaws is widely prevalent all over the parish. Treatment has been limited to 14 of the worst cases brought to Hospital.

Montego Bay.—Yaws very prevalent all through the district. 384 cases treated. All had symptoms cured.

May Pen.—There has been a marked decrease in the number of cases of Yaws especially in the districts of Rock and Mocho although the disease is fairly prevalent in a few other districts. Over 200 cases were treated during the year with Kharsivan and Novarsenobenzol. Of these over 96% were cured of symptoms. In addition to the injection of Kharsivan, small doses of Iodide of Potassium were given in quite a number of cases. These cases reacted more readily and quickly and in no instance has there been a case of recurrence. The D.M.O. is of opinion that if small doses of Iodide Potassium be given shortly after an injection and kept up for 2 or 3 weeks that the ultimate result is not only a cure of symptoms but a cure of the disease.

Newport.—Yaws prevails in some of the outlying districts.

Old Harbour.—Yaws is still very prevalent in the mountainous districts. 101 cases have been treated by Salvarsan.

Port Maria.—Yaws is very prevalent throughout the whole district and is on the increase. 47 cases were treated in Hospital with Salvarsan and Kharsivan and 102 cases as outpatients with gratifying results.

Port Royal.—No cases of Yaws.

Richmond.—Yaws is very prevalent throughout the district. During the year 101 cases were specially treated with intramuscular injections of Arsenobillon. The results obtained were uniformly excellent and the people gladly submitted to the treatment. In all the cases the sores cleaned up rapidly and the patients were apparently cured.

Stony Hill—Yaws is very prevalent throughout the district. 54 cases were injected with Kharsivan—chiefly in the Mt. James district all cured save one.

Sav.la-Mar—Yaws still exists in the district as it has always done. Probably not more in evidence than usual.

St. Ann's Bay—Yaws exists. 139 cases treated. 125 had symptoms cured.

Ulster Spring—Numerous cases of Yaws have been treated with Salvarsan with fair results. Particularly noticeable in the districts of Sawyers, Troy, Tyre and Crownlands.

YAWS TREATMENT.

	Total Cases.	Number of injections.		Variety.			Recurrent.	Previously injected.	Method.			Drug used.	Average time for cure of Symptoms.	Symptoms cured.
		First.	Second.	General.	Crab.	Mixture.			Intravenous.	Intramuscular.	Otherwise.			
<i>Hospitals—</i>														
Morant Bay	14	14	—	12	2	—	—	—	—	14	—	Kharsivan	Days 3-22	13
Hordley	83	83	—	64	19	—	3	1	—	83	—	Kharsivan	5-40	62
Port Antonio	451	440	11	—	—	—	26	17	193	258	—	Salvarsan, Kharsivan & Arsenobenzol	3-78	353
Buff Bay	200	200	—	156	44	—	16	—	—	200	—	Kharsivan & Arsenobillon	5-235	191
Annotto Bay	54	50	4	43	5	6	1	—	—	54	—	Kharsivan	6-44	54
Port Maria	32	29	3	29	3	—	2	—	—	32	—	Kharsivan & Arsenobillon	2-61	32
St. Ann's Bay	20	16	4	20	—	—	1	—	—	11	9	Salvarsan	8-47	14
Cave Valley	1	1	—	1	—	—	—	—	—	1	—	Kharsivan	14	1
Falmouth	9	9	—	9	—	—	—	—	—	9	—	Kharsivan & Arsenobenzol	22	1
Ulster Spring	5	5	—	5	—	—	1	1	—	2	3	Kharsivan Salvarsan & Arsenobillon	7-14	4
Montego Bay*	—	—	—	—	—	—	—	—	—	—	—	Salvarsan	—	—
Lucea	193	183	10	172	21	—	—	—	—	193	—	Kharsivan & Arsenobillon	5-61	172
Sav.-la-Mar	2	2	—	2	—	—	—	—	—	2	—	Salvarsan	18	2
Black River	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mandeville	11	7	4	6	5	—	—	—	—	4	7	Salvarsan & No-arsenobillon	17-38	7
Chapelton	2	2	—	2	—	—	—	—	—	2	—	Arsenobillon	—	2
Lionel Town	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Spanish Town	14	7	—	14	—	—	7	2	—	14	—	Kharsivan	10-38	14
Linstead	27	21	6	25	2	—	2	—	—	27	—	Kharsivan & Arsenobenzol	5-103	27
<i>Districts—</i>														
Christiana	51	51	—	39	12	—	—	—	—	51	—	Kharsivan	10-14	51
Buff Bay	51	51	—	43	8	—	—	—	—	51	—	Kharsivan	10-20	51
Buff Bay	57	57	—	37	20	—	14	2	—	57	—	Arsenobillon	7-17	41
Annotto Bay	54	50	4	43	5	6	1	—	—	54	—	Kharsivan	6-44	54
St. Ann's Bay	59	52	7	32	23	4	12	—	—	59	—	Arsenobenzol	—	59
Ditto	52	52	—	52	—	—	52	52	—	52	—	Arsenobillon, No-arsenobillon	43	47
Port Maria	103	24	79	100	3	—	—	—	—	103	—	Kharsivan	77	79
Richmond	50	48	2	41	8	1	1	1	—	50	—	Arsenobenzol	26	50
													8 days 4 wks.	

* 354 cases treated as outpatients.

YAWS TREATMENT.

	Total Cases.	Number of injections.		Variety.			Recurrent.	Previously Injected.	Method.			Drug used.	Average time for Cure of Symptoms.	Symptoms Cured.
		First.	Second.	General.	Crab.	Mixture.			Intravenous.	Intramuscular.	Otherwise.			
<i>Districts, contd.</i>														
May Pen ..	57	57	—	55	2	—	—	—	—	57	—	Arsenobenzol Billon	—	57
May Pen ..	53	52	1	51	2	—	—	—	—	53	—	Kharsivan	—	53
May Pen ..	102	101	1	98	4	—	—	—	—	102	—	Arsenobenzol Billon	—	102
Balaclava ..	51	48	3	7	33	1	—	—	—	51	—	Kharsivan	8	51
												Novarsenobenzol	3	
Balaclava ..	51	45	6	41	7	3	3	1	—	51	—	Arsenobenzol	40	
Ditto	54	52	2	40	12	2	9	—	—	54	—	Arsenobenzol Billon	—	51
Ditto	42	42	—	11	23	8	8	—	—	42	—	Arsenobenzol Billon	—	52
												Arsenobillon	17	
												Novarsenobillon	25	42
Falmouth ..	55	47	8	43	11	1	—	—	—	55	—	Arsenobenzol Billon	—	53
	52	47	5	47	5	—	2	—	—	52	—	Arsenobenzol, Billon	—	52
Stony Hill ..	55	55	—	52	3	—	—	—	—	55	—	Kharsivan	—	54
Gordon Town ..	51	43	8	45	6	—	—	—	—	51	—	Arsenobillon	12-28	51
Gayle ..	51	44	7	45	6	—	6	—	—	51	—	Kharsivan	7 days	51
													-3 wks with 1 exception	
Plan. Garden River	54	53	1	54	—	—	—	—	—	54	—	Arsenobenzol	—	53
Ditto ..	51	51	—	46	5	—	1	1	—	51	—	Kharsivan	30	51
												Arsenobenzol	20	
Ditto	50	50	—	44	6	—	—	—	—	50	—	Salvarsan	1	
												Arsenobillon	8-10	50
Linstead ..	44	39	5	30	12	2	6	—	—	44	—	Galyl	All cured	
												Arsenobenzol	12	44
Ditto ..	25	19	6	18	5	2	2	—	—	25	—	Arsenobenzol	42	
Ditto ..	14	5	9	10	3	1	—	—	—	14	—	Arsenobenzol & Galyl	—	25
Ditto	50	50	—	46	4	—	—	—	—	50	—	Arsenobenzol	All cured within 14 days	50

Buff Bay—As these cases were injected just before the end of the financial year under review the 16 of them are still under treatment and supervision. One of the recurrent previously injected cases had been treated with 606 compound about 5 months previously and the other between 2 and 3 years previous.

Port Maria—Those not cured of symptoms are still under treatment.

Richmond—The patient who had been previously injected stated that he had been injected on the previous occasion for crab yaws on this occasion it was for general yaws. All these cases are injected at Dr. Ritchie's surgery and sent home. Marked improvement noted in three days, generally. The beneficial results are so marked that patients come and apply for treatment without being fetched out by the District constable.

May Pen—The second injection in one case was a case of "Crab Yaws."

Balaclava—The crab yaws took much longer to heal than the general Yaws. One interesting case of crab Yaws was treated and cured in the case of a peasant who had as he said endured tortures for 53 years. Two doses of Kharsivan cured him in two months. The Yaw cake was $\frac{1}{2}$ an inch thick on both feet. Another case of crab yaws had been suffering for 18 years and was cured by Arsenobenzol.

One recurrent case had been treated previously with Kharsivan and the other two with drugs under the old system.

Most of these cases cleared up in from 11 to 18 days.

Falmouth—The case that had the mixture of both varieties did not return, while one case showed no improvement.

Stony Hill—Roughly cured in 3 weeks.

Plan. Garden River—The recurrent case had been treated on the first occasion on 24.12.15. On this occasion it was injected on 6.9.16 and cured in 9 days.

Linstead—One case of general Yaws required 3 injections of Galyl 20 cgm each dose and took 136 days to cure. One case of crab Yaws was injected first with Galyl 10 cgm and the second time with arsenobenzol.

Two cases of general yaws were injected first with Galyl and three with Arsenobenzol.

Dr. Clark states that the results with arsenobenzol have been much better than those with Galyl and are so markedly successful that people now come for treatment of their own accord without being fetched out by the District Constable.

4 persons had two injections of Arsenobenzol. 1 person had 1 injection of Galyl and one of Arsenobenzol.

3 persons had 1 injection of Galyl followed by 3 injections of arsenobenzol.

1 person had 1 injection of Galyl and 2 of arsenobenzol.

ED. The doses given at first seem to have been very small of the 5 who only had one dose, four were treated with arsenobanzol and 1 with Galyl.

14. RETURN OF DEATHS.

Parish.	Total Deaths.	Deaths not medically certified.	Deaths under one year.	Deaths under 5 years.	Deaths from Vomiting Sickness	Deaths from Enteric Fever.
Kingston	2,034	321	468	676	5	66
Port Royal	18	1	3	8	..	..
St. Andrew	1607	843	307	493	9	13
St. Thomas	1,102	797	252	462	..	10
Portland	1,144	768	273	425	3	16
St. Mary	1,691	1,231	417	720	18	18
St. Ann	1,730	1,420	452	756	8	12
Trelawny	982	808	279	429	32	4
St. James	1,032	818	292	426	11	2
Hanover	963	750	275	420	..	1
Westmoreland	1,642	1,272	472	754	1	14
St. Elizabeth	1,739	1,499	490	787	11	5
Manchester	1,285	1,091	312	493	11	11
Clarendon	1,950	1,614	480	859	42	11
St. Catherine	2,713	2,052	669	1,141	5	21
Whole Island	21,632	15,285	5,441	8,849	156*	204

* June 2, 1916 .. 8
 Sept. " .. 9
 Dec. " .. 8
 March 2, 1917 .. 131 156

15. VENEREAL DISEASES.

The question of Venereal disease has been brought prominently to public notice during the year not only on account of the publishing of the Report of the Royal Commission that considered the question of Venereal diseases in Great Britain but more so on account of the very large number of temporary rejections of wouldbe recruits who presented themselves for examination at Camp and elsewhere for admission to the various War Contingents. The large number of rejections on this account gave one a much better idea as to the prevalence of venereal disease among the peasantry and labouring classes of Jamaica than could have been obtained from the Medical men of the Island for the simple reason that most medical practitioners have been very truly recording the fact for years past that by far the greater number of those who suffer from Gonorrhoea without complications never go to see a doctor at all but prefer to go to Dispensers and other unlicensed practitioners many of whom carry on a regular practice in these

diseases a practice which has been very justly condemned by the British Royal Commission, and which will continue until made penal, the cloak for such practice apparently being that the disease is a "*simple ailment*" and one that in their opinion may be treated over the counter and I may add "elsewhere also."

The Medical Practitioners who could be of the greatest service to such sufferers in the early stage of the disease are ignored until some complication occurs or money runs short when resort is had to them as qualified to treat such diseases.

Similarly with syphilis—Syphilitic chancres are doubtless treated as "simple ailments" and when the unfortunates who suffer from these "simple ailments" have been fleeced by dispensers, quacks, charlatans, obeahmen, etc., they find their way to the doctor or to the hospitals only when secondary or tertiary symptoms have supervened: continuous treatment on all probability having been neglected, if indeed ever insisted upon or recommended, by the dispenser or other unlicensed person who treated the case.

The great principle to be remembered in the treatment of venereal diseases is that "a stitch in time saves nine" in other words early treatment is necessary.

Valuable time is lost by unlicensed treatment and many a woman who suffers from miscarriages and internal troubles has to thank the dispenser or the quack who treated her husband or paramour for a so-called "simple ailment" while the Poorhouses are full of cases that have neglected treatment and become a permanent charge on Parochial rates.

Until quack practice is rendered not only illegal but heavily punishable, if necessary even by withdrawal of the license of any dispenser who treats venereal disease at all, so long will the ignorant public have to continue suffering on account of a practice that can very easily be stopped by Law.

I consider it absolutely necessary that a Venereal Disease Law should be enacted in order to help the public and with a view to guiding them as to whom they should go for treatment when suffering from venereal disease.

I would even go so far as to compel dispensers to put a Board over their shops with a notice to the effect that they are not qualified or permitted to treat venereal disease it not being a "simple ailment."

With regard to women who carry on the profession of Prostitutes, one can only refer again to the case mentioned in the *Lancet* of 23/9/16 Page 567 and recently referred to by me in the Legislative Council where Professor Blaschko after an investigation in Poland discovered that 135 men of a German Landsturm regiment were found to be suffering from Gonorrhoea which in each case was found to be traceable to one and the same little Polish girl aged 13.

The necessity for some enforced inspection and treatment of prostitutes would seem to be shown to be necessary by this case as it is evident what an enormous amount of damage can be done by one girl or woman and by those who solicit publicly or otherwise and by those to whose houses men are known to resort.

I might add that compulsion is necessary in regard to enforcing continuous treatment of those infected by venereal disease. It is so common to hear of patients entering Hospital for a day or two or attending the outpatient room of a Hospital once or twice and then either asking for their discharge from hospital or ceasing to attend the outpatient room.

With regard to this please compare Dr. Ross' report about men of the contingent who were admitted to the Public Hospital Kingston on their discharge from Camp and who refused to stay in Hospital.

"Extract from Sir William Osler's Lettsomian Oration delivered before the Medical Society of London." On May 14, 1917, on Page 694 of the *British Medical Journal* Sir W. Osler in speaking of sterility in women states that:

"a large majority were innocent victims of infection by husbands who thought themselves free from all traces of what they regarded as a harmless indiscretion of youth, and who could have been cured under a proper system of control and treatment."

This statement emphasizes, as I have often done before, the necessity for "Control."

On page 695 of the same Edition of the *British Medical Journal* (May 26, 1917) under heading "Compulsion or Persuasion," Sir William Osler states as follows:—

"For any legislation to be successful the people must be prepared. We were committed to a campaign of education and an elaborate scheme of treatment. Two circumstances made it probable that these measures would not suffice to meet the enemy. So deep was the stigma associated with the disease that patients avoided hospital and even their family doctors. To be successful in any fight the primary essential was to know where the enemy was placed. Realizing as fully as any one the strong arguments against "notification" the gravity of the situation overweighed with him all private considerations and he felt sure that within a year we should be ready for the change. It worked well in the Scandinavian countries and the results from those Australian dominions in which it had been introduced would be interesting.

"The other point really more serious was also connected with notification. Both syphilis and Gonorrhoea required "protracted treatment" and the primary symptoms were often so slight that it was impossible to get patients to continue a course of medication lasting a year or more.

"Reports from a Boston Hospital showed that 28 per cent. of the patients did not return and to a New York Venereal Clinic 29 per cent. of the syphilitics came but once. To be successful in this fight we must have "control" of the patients—the treatment must be "compulsory," it was so in the Army. If the House of Commons represented outside opinion, the public was a long way from appreciating the appalling risks they ran."

During the year two cards were issued by the Central Board of Health for use by Medical Practitioners, one giving advice concerning syphilis and one concerning Gonorrhoea and copies have been sent to the various Hospitals for distribution to those who attend those Hospitals suffering from these diseases.

They will also be sent to the District Medical Officers as soon as free treatment is begun.

INSTRUCTIONS TO THOSE HAVING GONORRHOEA OR CLAP.

You have a serious infective disease, which, however, yields to treatment.

If treatment is neglected it may continue for years after the discharge ceases although you think that you are quite well. During this period, although the visible discharge has ceased, it is possible for

you to give this disease to others, therefore, you must not marry or have any sexual relations until a reputable physician has pronounced you cured. It is a very grave disease in women. As a result of it they may never have children or may be made invalids for life or be compelled to undergo very serious operations. A child born to a woman with this disease may become blind. Clap is never the result of a strain.

For your own protection and the protection of others observe the following rules:

1. Always wash your hands after handling the parts; the discharge, if carried to the eyes, may make you blind.
2. Sleep alone and be sure that no one uses your toilet articles, particularly your towel, and wash cloth, sponges, etc., so as not to infect any one else.
3. Never lend your syringe to anyone, and as soon as you are well destroy it.
4. Avoid all sexual relations and excitement until pronounced cured and do not think that you are cured because the visible discharge has ceased. You may still be able to infect others although the discharge has ceased.
5. Be sure that your bowels move every day. If they do not, take a laxative.
6. Live moderately. Take plain food.
7. Do not use alcohol in any form, as it always prolongs the disease. Take no Rum, Beer or Spirits.
8. Drink from six to eight glasses of water or barley water a day, but not late in the evening.
9. Avoid all spicy or peppery foods and drinks, such as ginger ale, mustard, pepper and horse-radish. Drink no tea nor coffee.
10. As long as there is much discharge, walk as little as possible; walking keeps up the discharge and may cause Bubo.
11. Be sure to continue treatment until pronounced cured. Avoid advertising doctors and drug stores or self-medication or oboahmen.
12. Burn all soiled rags and dressings for any one else who touches them may become infected.

ISSUED BY THE CENTRAL BOARD OF HEALTH.

INSTRUCTIONS TO THOSE HAVING SYPHILIS.

Your disease is not only a skin disease, it is a disease of the whole body which may greatly injure the heart, liver, bones, brain and nerves. It is a very serious disease, often leading to injury or destruction of important parts, such as the eyes, or to such injury of the blood vessels and heart which may result in sudden death or to such damage to the spinal cord and brain as to cause paralysis and insanity. In women it causes miscarriage and sterility.

But it can be cured if you are willing to continue the proper treatment long enough and will follow your physician's directions. The earlier you place yourself under proper treatment the more likely will be your cure.

When your present trouble is over you may think your disease has been cured and you may then neglect further treatment. The object of this card is to warn you against this mistaken idea. The disease may be present "in the blood" without showing any outward signs and may strike you down even after twenty years of apparent good health. Your physician will tell you when you may stop treatment. You must report to him for treatment or for blood tests for several years; but *do not think you are cured because you feel well and do not see anything wrong with yourself.*

The disease is infective and unless you are very careful you may give it to some one in your family or to friends. Do not marry until your physician gives you permission to do so. You may infect not only your wife, but you may transmit the disease to your children.

1. Always sleep alone so that you may not infect anyone else.
2. Always use separate towels, washcloth, brushes, comb, razors, soap, sponge, etc., and never let anyone else use yours otherwise they may infect some one else.
3. Never permit anyone to use anything which has been in your mouth, such as tooth brushes, tooth picks, pipes, cigars, cigarettes, pencils, spoons, forks, cups.
4. Brush your teeth several times a day at any rate after each meal.
5. If you have to see a dentist, tell him about your disease before he examines your teeth.
6. Do not kiss anyone, for if you have sores on your lips you may infect the person you kiss.
7. Do not have sexual intercourse during the first year nor thereafter until you have permission from your physician.
8. Always burn dressings or bits of lint or cotton that have been on a sore.
9. Do not smoke or chew tobacco. Do not take any alcoholic drinks, such as beer, gin, whisky, brandy, etc.
10. Avoid all spicy foods and drinks, such as mustard, etc.
11. Always tell your physician whom you may hereafter consult for any illness that you have had this disease.
12. Avoid quacks and drug store and self-medication.
13. Don't bathe in a bath or tub that is used by anyone else and never use a bath or tub that is used for other purposes than for bathing.

ISSUED BY THE CENTRAL BOARD OF HEALTH, JAMAICA.

REPORTS FROM DISTRICT MEDICAL OFFICERS.

SYPHILIS.

Annotto Bay.—Syphilis is rampant and is the cause of many unplaced diseases, *e.g.*, miscarriages and adherent Placentae. Usually in secondary and tertiary forms.

Adelphi.—Syphilis is extremely prevalent. It is met with in all stages in young and old. More than half the people that apply for Parochial aid are suffering from this disease in one stage or another.

Buff Bay.—Syphilis is extremely prevalent especially in the tertiary and congenital forms. 147 cases have been treated in hospital. The D.M.O. thinks it is on the increase.

Balaclava.—Conditions remain the same.

Black River.—Prevalent. Generally met with in the Tertiary stage. Noticeable among young people. Probably on the increase.

Cave Valley.—Prevalent. Doubtless the cause of some miscarriages. State chiefly secondary and tertiary. Chiefly between 20 and 30 years. The D.M.O. does not think it is on the increase.

Claremont.—Syphilis is prevalent but very few apply for treatment. It is largely accountable for miscarriages. It is seen in all stages, mostly secondary and tertiary.

Chapelton.—Syphilis met with but the number of persons attacked was not greater than in previous years nor was there any special virulence in the type of the disease.

Christiana.—Is most prevalent and is met with in all stages among old and young and is greatly on the increase.

Crofts Hill.—Syphilis exists to some extent. It is also accountable for a large number of miscarriages. Generally seen in the secondary and tertiary stages. Is noticeable among children and young people. The D.M.O. does not think it is on the increase.

Duncans.—Several cases of Primary syphilis seen during the year. Many others are of course not seen, all forms of the disease are encountered. Many cases of miscarriage are due to this disease. Met with in the tertiary stages chiefly. Many young people suffer from this disease. A few months ago the D.M.O. was consulted by five young men with the primary disease all within the week. Cannot say that it is on the increase.

Falmouth.—Syphilis prevalent. Generally seen in secondary and tertiary stages. Few miscarriages seen. Noticeable among young people. On the increase.

Gordon Town.—Fairly prevalent. Most often met with in the tertiary stage. Noticeable among young people. Cannot say whether it is on the increase.

Gayle.—Prevalent. Generally met with in the tertiary stage. A few young people can be seen here and there suffering from the results. Does not appear to be on the increase.

Grange Hill.—Is fairly prevalent. In the case of paupers it forms the basis of 95 per cent. of cases that apply for relief. Generally seen in the tertiary stage. Seen in congenital form in infants.

Hagley Gap.—Syphilis is prevalent but very little attention is paid to it by sufferers. It may account for certain number of miscarriages. Generally seen in the tertiary stage. Does not think it is on the increase.

Hordley.—Syphilis is still prevalent. One case of miscarriage is known as being due to it. It is generally seen in the tertiary and congenital stages, and is often noticeable among young people. It is difficult to say whether it is on the increase or not.

Lower St. Andrew.—Syphilis is very prevalent most cases are seen in the Almshouse. They are usually in the tertiary stage. Has not heard of any miscarriages traceable to this disease. Has not seen many cases among the young.

Lucea.—Syphilis is prevalent and met with in all stages. It attacks all ages.

Lamb's River.—One case of Syphilis treated. The people seldom come to the doctor for treatment but go to the dispenser or bush doctor. The D.M.O. is however of the opinion that the disease is prevalent. They attribute this disease to lifting heavy weights and usually want something to rub on to sink the swellings. Is prevalent among the young people.

Little London.—The people in this district are remarkably free from Syphilis.

Lionel Town.—Syphilis has considerably decreased. Not accountable for miscarriages. Secondary stage chiefly met with. Young people infected.

Linstead.—Syphilis is very prevalent at all stages and noticed among young people. Probably on the increase.

Morant Bay.—Syphilis is very prevalent and without doubt accounts for many miscarriages. It is generally seen in the tertiary stage and is common at all ages.

Montego Bay.—Syphilis very prevalent. Is accountable for miscarriages. Seen in the secondary and tertiary stages especially chronic. Very noticeable among young people. Is increasing.

May Pen.—Syphilis fairly prevalent. Met with chiefly in tertiary stage, and more so in the old. Thinks that the disease is on the increase.

New Port.—Syphilis is prevalent in all parts of the district. All stages are met with. Among young people.

Old Harbour.—Congenital and tertiary syphilis are very prevalent. Secondary cases are also commonly seen. Primary cases rarely seek treatment. The disease does not appear to be on the increase.

Port Maria.—Very prevalent. Accountable for many miscarriages. Usually secondary or tertiary stages. Many more primary cases now seen owing to the examination for the contingent. Majority of secondary cases seen among young people. Thinks it is on the increase.

Port Royal.—No cases treated.

Richmond.—Syphilis is very prevalent in the district and is on the increase. It is usually seen in the secondary and tertiary stages—seldom seen in the early primary stage. Undoubtedly the great majority of abortions and miscarriages which occurred were due to this disease. Children suffering

from congenital syphilis were often seen, but usually brought for treatment when suffering from some intercurrent disease. Syphilitic ulceration of the throat among young adults was quite frequently observed.

Stony Hill.—Is not very prevalent, usually met with in secondary and tertiary stages and not noticeable among young people. Not on the increase. Not many miscarriages.

St. Ann's Bay.—Prevalent. Accountable for miscarriages and noticeable among young people. Seen in primary and secondary stages. Cannot say if on the increase.

Santa Cruz.—Fairly prevalent. One is rarely consulted for miscarriages, but there is no reason to doubt that miscarriages in the syphilitic in Jamaica prevail as in other countries. Does not think it is on the increase.

Sav-la-Mar.—Syphilis is prevalent in all its stages and is probably accountable for many miscarriages. Persons of all ages appear to suffer from it.

Ulster Spring.—Several cases of Primary syphilis seen but the disease was more commonly seen in the later stages, often among the young.

GONORRHOEA.

Annotto Bay.—Gonorrhoea is lessening but still of sufficient numbers.

Adelphi.—Gonorrhoea is prevalent. Is increasing.

Buff Bay.—Is extremely prevalent and is usually accompanied by complications especially rheumatism, stricture and cystitis. It is decidedly on the increase. 135 cases treated in Hospital.

Black River.—Prevalent. Accompanied by complications. Is probably on the increase.

Cave Valley.—Prevalent. Complications frequent. Does not think it is on the increase.

Claremont.—Is not on the increase.

Christiana.—Is prevalent.

Crofts Hill.—Prevalent. The Doctor is only consulted for this disease when complications such as Cystitis Epididymitis occur. No comparison can be given between complicated and uncomplicated cases. Does not appear to be on the increase.

Duncans.—Gonorrhoea exists in all parts of the district. 70 per cent. of the young people contract it. All sorts of complications are seen. Rheumatism is very common.

Falmouth.—Gonorrhoea is prevalent often accompanied by complications. Is on the increase.

Gordon Town.—Is ever present and seems to be on the increase. Ignorance of the dangers of this disease leads to complications of every sort and helps to disseminate the infection.

Gayle.—Extremely prevalent. Accompanied by orchitis and stricture. Is on the increase.

Grange Hill.—Is only seen as a rule when complications compel the patient to see a doctor. Most of the cases go to a dispenser or take bush remedies or go to the obeah man who is more consulted and who makes more money than most medical men, this is especially true of this district.

Hagley Gap.—Like Syphilis it is difficult to give any account of the condition as the sufferers rarely attend to it.

Hordley.—Has been very much in evidence. It is apparently on the increase and is frequently accompanied by complications.

Lower St. Andrew.—Is very prevalent and its complications are constantly met with,

Lucea.—Gonorrhoea is prevalent and frequently accompanied by complications. Is on the increase.

Lamb's River.—Several cases of Gonorrhoea. Cases seen are usually chronic cases and those with complications.

Little London.—Gonorrhoea does occur but not to any extent. It is not on the increase.

Lionel Town.—Gonorrhoea is also on the decrease. Many of the cases met with are complicated with strictures.

Linstead.—Gonorrhoea is prevalent accompanied by complications. It is chiefly for the complications that relief is sought. It is on the increase.

Morant Bay.—Gonorrhoea is frequently met with and all complications are seen.

Montego Bay.—Very prevalent and generally accompanied by complications. Is on the increase.

May Pen.—Prevalent. Some cases with complications. On the increase.

Newport.—Gonorrhoea is very common here almost all complications are seen.

Old Harbour.—Gonorrhoea and its sequelae is also frequent, but these affections do not seem to be increasing.

Port Maria.—Very prevalent. Often accompanied by complications owing to the neglect in treatment of acute stages. Does not think that it is on the increase.

Port Royal.—No cases treated among civil population.

Richmond.—Gonorrhoea was exceedingly prevalent—more so than syphilis; this was particularly evident when examining recruits for the Jamaica War Contingent. Of a total of 235 men rejected by the D.M.O. for the 5th Contingent 112 were refused because of Gonorrhoea. A number of men suffering from chronic gleet appeared to be ignorant of the fact and were often with difficulty convinced that they were infected. Some seem to regard it as a necessary evil and take no steps to have it treated unless they happen to develop some painful complication. Orchitis, Arthritis and Cystitis are the complications most frequently met with.

Stony Hill.—Freely prevalent often accompanied by complications and markedly on the increase.

St. Ann's Bay.—Prevalent. Accompanied by complications. Not on the increase.

Santa Cruz.—Prevalent. Accompanied by complications. Is believed to be increasing.

Sav-la-Mar.—Gonorrhoea is prevalent and the remarks made last year still hold good.

Ulster Spring.—Frequently seen during the year and frequently accompanied by complications such as Ophthalmia Neo ophthalmia, Salpyngitis and Epididymitis and stricture.

16. *Hookworm Infection*.—Stools examined locally at the Public General Hospitals for Hookworm.

Hospitals.	No. examined.		No. found infected.	
	Coolies.	Creoles.	Coolies.	Creoles.
Morant Bay	12	36	8	11
Hordley ..	2	1	2	1
Port Antonio ..	76	184	51	117
Buff Bay ..	27	22	22	18
Annotto Bay	—	—	—	—
Port Maria ..	—	—	—	—
St. Ann's Bay	—	—	—	—
Cave Valley	—	—	—	—
Falmouth ..	—	—	—	—
Ulster Spring	—	62	—	32
Lucea	—	26	—	26
Montego Bay	219	38	10	1
Sav.-la-Mar ..	1,210	10	587	7
Black River	—	—	—	—
Mandeville	—	—	—	—
Chapelton ..	—	—	—	—
Lionel Town ..	—	—	—	—
Spanish Town ..	208	76	208	76
Linstead ..	—	—	—	—
	1,754	455	888	289

Examination by Government Pathologist.—Stools sent up from Hospitals for examination for Hookworm:—

Hospitals.	No. examined.		No. found infected.	
	Coolies.	Creoles.	Coolies.	Creoles.
Morant Bay	—	—	—	—
Hordley ..	58	92	50	64
Port Antonio ..	—	—	—	—
Buff Bay ..	144	288	115	232
Annotto Bay ..	526	1	414	1
Port Maria ..	293	4	256	4
St. Ann's Bay ..	1	145	1	138
Cave Valley	—	—	—	—
Falmouth	129	6	79	6
Ulster Spring ..	—	—	—	—
Lucea ..	4	167	4	115
Montego Bay ..	—	—	—	—
Sav-la-Mar ..	12	—	4	—
Black River ..	6	116	1	48
Mandeville	—	229	—	165
Chapelton ..	—	114	—	87
Lionel Town	253	101	132	17
Spanish Town ..	377	147	305	102
Linstead ..	30	118	28	92
	1,833	1,414	1,389	1,071

Examination of Stools at the Spanish Town Prison.

Total cases examined	..	..	..	437
Infected	..	..	..	378

Report by Dr. Grabham on Hookworm Infection at the General Penitentiary.

58 cases examined for Hookworm during the year ended 31st March, 1917. These were cases admitted to the prison hospital suffering from Anæmia.

33 positive cases
25 negative cases.

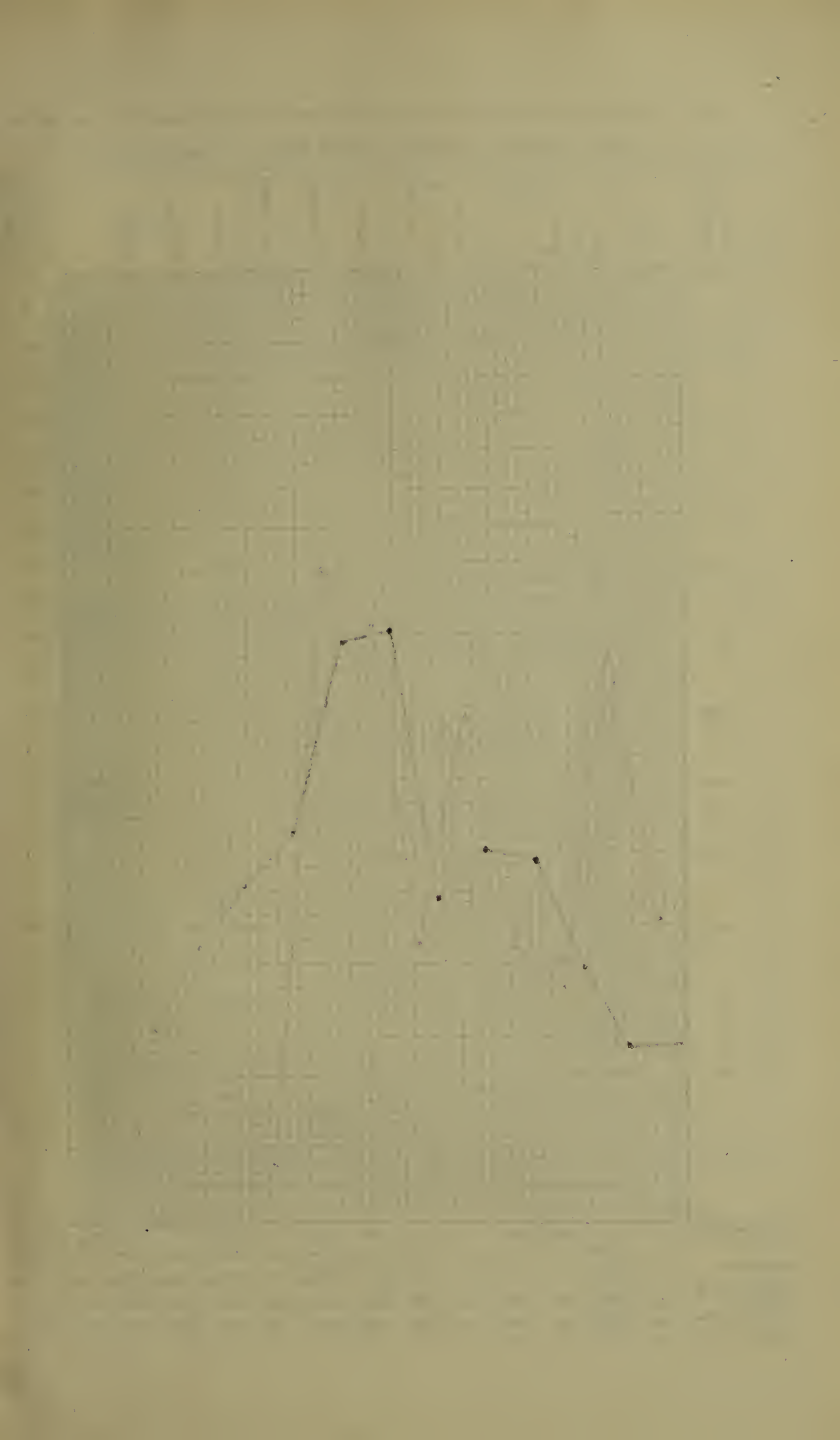
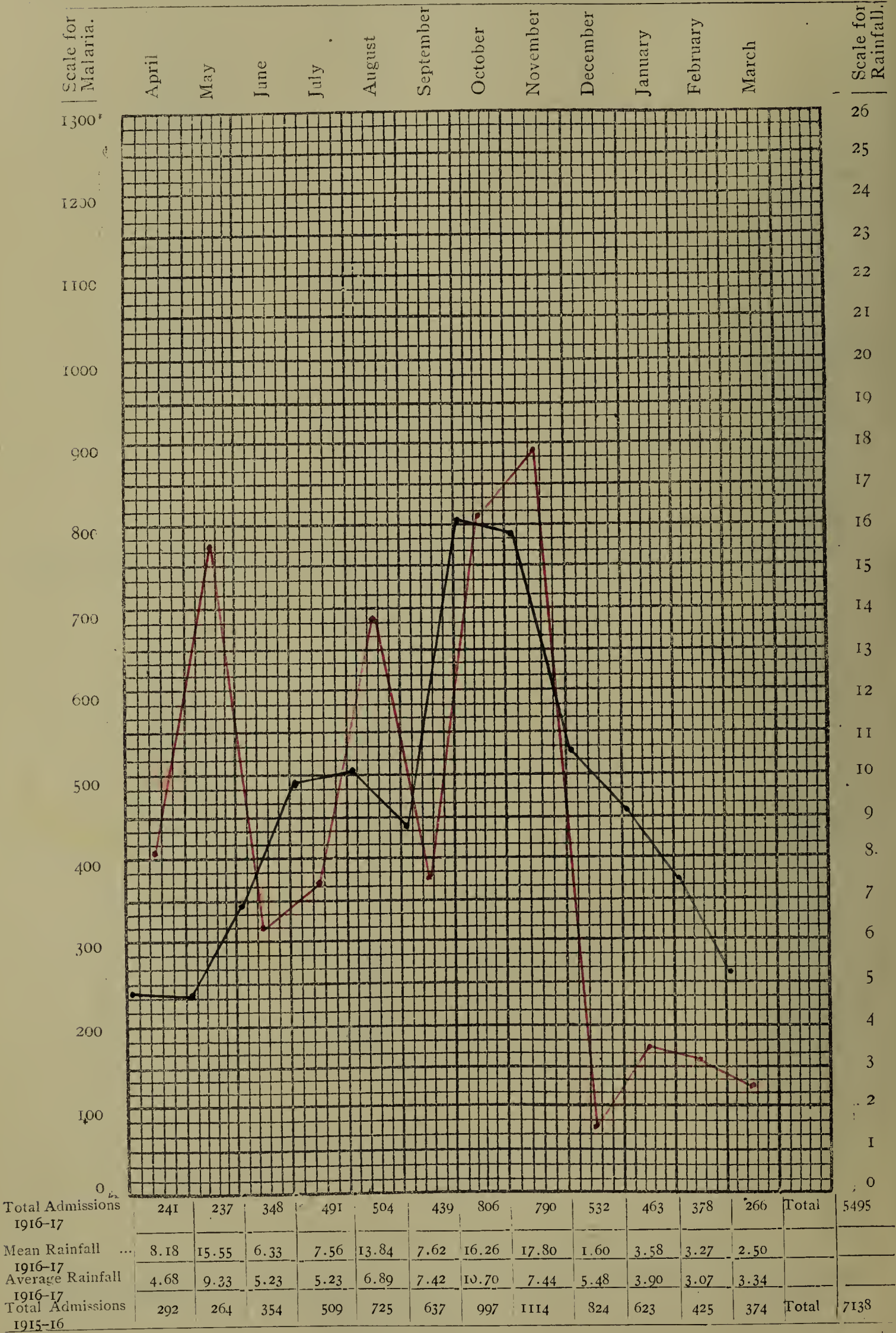


Chart showing the monthly number of admissions to the Public Hospitals in Jamaica for Malaria as well as the monthly Rainfall during the Financial year.



Number of cases thymolised or treated in any other manner for Hookworm at the various Hospitals.

Hospitals.	Naphthol B.			Eucalypt.			Thymol.			Oil of Chenopodium.			Quassia.			Total.		
	Creoles.	Coolies.	Out-Patients.	Creoles.	Coolies.	Out-Patients.	Creoles.	Coolies.	Out-Patients.	Creoles.	Coolies.	Out-Patients.	Creoles.	Coolies.	Out-Patients.	Creoles.	Coolies.	Out-Patients.
Morant Bay	21	49	5	..	..	..	..	..	..	21	49	5
Hordley	6	21	..	20	10	11	37	20	10	63	51	21
Port Antonio	..	7	1	..	3	12	182	178	37	86	61	7	23	11	1	301	252	57
Buff Bay	264	132	..	..	..	..	..	..	..	264	132	..
Annotto Bay	1	414	..	..	..	..	..	..	..	1	414	..
Port Maria	9	361	7	..	..	..	..	6	..	9	367	7
St. Ann's Bay	71	..	1	..	..	..	21	..	..	92	..	1
Cave Valley
Falmouth	33	4	..	..	..	..	4	..	..	37	4	..
Ulster Spring	28	..	4	..	..	..	..	..	..	28	..	4
Montego Bay	11	100	..	..	..	..	27	128	..	38	228	..
Lucea	21	..	..	14	..	..	53	..	..	88	..	..
Sav.-la-Mar	1,518	2	1	775	..	..	..	2,293	2
Black River	33	1	..	..	..	..	3	..	1	36	1	1
Mandeville	27	..	3	..	..	..	110	..	..	137	..	3
Chapelton	6	..	..	3	..	..	7	..	..	16	..	..
Lionel Town	172	292	..	..	..	..	..	..	..	172	292	..
Spanish Town	41	172	..	10	11	..	38	34	..	89	217	..
Linstead	72	26	2	..	..	..	15	1	..	87	27	2
	7	1	..	3	1	12	998	1,750	59	133	1,600	20	339	975	12	1,480	4,327	103

Twenty-four Indentured Immigrants were thymolised on the estates in Port Antonio, thirty-four in Richmond, and eight in Black River during the year.

17. Admissions to the various Hospitals month by month for Malaria.

Hospitals.	April.	May.	June.	July.	August.	September.	October.	November.	December.	January.	February.	March.	Total.
Morant Bay	8	11	8	15	12	11	25	13	14	10	12	6	145
Hordley	16	18	21	28	28	22	42	29	23	13	10	15	265
Port Antonio	22	21	19	21	55	40	75	71	27	29	25	20	425
Buff Bay	16	11	4	8	13	17	35	34	30	17	23	10	218
Annotto Bay	50	35	41	29	40	32	91	103	82	59	39	25	626
Port Maria	11	11	3	4	6	12	20	25	14	8	14	5	133
St. Ann's Bay	4	5	6	4	2	8	7	12	5	7	5	6	71
Cave Valley .. ..	..	..	..	..	1	..	..	..	..	..	..	..	1
Falmouth	1	3	3	7	4	7	9	16	11	7	12	..	80
Ulster Spring .. ..	..	..	..	..	..	1	..	1	1	..	3	2	8
Montego Bay	8	13	15	11	13	10	12	30	25	29	18	8	192
Lucea	7	6	7	10	4	2	2	4	4	3	8	7	64
Sav.-la-Mar	56	56	102	205	181	131	188	161	85	94	78	70	1,407
Black River	4	3	2	3	11	4	7	22	8	8	4	4	80
Mandeville	1	1	1	1	2	1	..	1	..	..	1	..	9
Chapelton .. ..	..	..	1	2	2	2	3	5	3	3	4	4	29
Lionel Town	27	24	55	82	65	83	187	171	133	97	55	50	1,029
Spanish Town	4	15	34	30	28	17	55	51	37	35	29	16	351
Linstead .. ..	..	1	..	1	..	1	2	3	5	1	2	1	17
Kingston	6	3	26	30	37	38	46	38	25	43	36	17	345
	241	237	348	491	504	439	806	790	532	463	378	266	5,495

18. Quinine Distribution.—Return shewing the amount of quinine supplied from April 1st, 1916, to March 31st 1917.

	No. of doses.	lbs.
Police for use—5 gr. doses	58,100	41.8 ozs.
“ sale	10,000	7.2 “
Post Offices for sale—Packets of 5 gr. doses	299,000	
“ 3 “	3,000	
“ 2 “	3,000	
“ 1 “	2,000	
Total	307,000	

Doses of 5 grains to Estates	102,200	73 lbs.
“ 5 “ Parochial Boards ..	4,900	3 lbs 8 oz
“ 5 “ Hospitals and Asylums	73,500	52 lbs. 8 oz.
Total receipts minus Police and Departments	£552 0 5	
Quinine sulphate sent to Hospitals and Asylums		127 lbs. 8 ozs.
Quinine sulphate sent to Parochial Boards ..		11 lbs. 5 oz.
Quinine sulphate sent to Estates the owners of which prefer to give it in liquid form rather than in tablets ..		4 lbs.

The price of quinine sold at Post Offices has not been changed although the price of quinine has greatly risen since the war commenced.

It was felt however, inasmuch as the public who buy quinine had become accustomed to pay $\frac{1}{4}$ d. for one 5 grain dose or 1d. for four 5 grain tablets in a small envelope, that any change might upset the sales, consequently the Government is the loser at the present time by the sale of quinine at the Post Offices, but after the war as before a small profit will be made.

19. *New Works—Port Maria.*—Re-erection of covered way blown down by the recent hurricane.

Lucea.—Erection of a Lightning Rod at the northern end of the main building.

20. *Dumping Ground at Ulster Spring Hospital.*—This is badly needed and has not yet been provided by the Parochial Board so that at present the Hospital night soil is still, I regret to say, buried within the compound.

21. *Absence of Isolation Wards.*—Some of the Public General Hospitals are sorely in need of Isolation Wards. Port Antonio, Morant Bay, Chapelton, Black River, St. Ann's Bay, Lucea, Montego Bay and Annotto Bay for instance, and these are works the absence of which often handicap the District Medical Officer severely.

The Public Hospital, Kingston, is in the same predicament.*

22. *Medical Attendance.*—It has been recognised for some long time that one Medical Officer is very much handicapped by being put in charge permanently both of a large hospital and a district as well, and increased medical service should be provided where the number of patients is very great.

An attempt was made some years ago to allow for an extra medical officer at Annotto Bay, this however was vetoed by the Legislative Council, but is a matter that will need to be faced sooner or later as it is obviously impossible to expect one Medical Officer to treat a hundred or more patients if he has in addition to carry on a private practice in order to make a livelihood his Government salary being a very small one.

The above does not, of course, refer to medical practitioners who are only acting temporarily. At the same time no Medical Officer accepting such a billet is justified in neglecting his work on the plea of too much to do.

23. *Increase in number of beds in various Hospitals.*—The following increases in bed accommodation were allowed for the coming year by the Legislative Council that sat at the end of this year:—

Morant Bay	Hospital	..	..	5
Port Maria	“	..	..	5
St. Ann's Bay	“	..	..	8
Falmouth	“	..	..	9
Cave Valley	“	..	..	4
Lucea	“	..	..	5
Black River	“	..	..	16
Mandeville	“	..	..	8
Chapelton	“	..	..	5
Linstead	“	..	..	10
Spanish Town	“	..	..	5

The following reductions were agreed to:—

Buff Bay	“	..	..	40
Sav.-la-Mar	“	..	..	30
Lionel Town	“	..	..	25

Th last three are coolie hospitals, there having been no new batch of coolies landed during the year.

It will thus be seen that increases have taken place in the creole hospitals while it has been possible to make reductions in the coolie hospitals.

24. *Buff Bay Hospital.*—The Hon. S. S. Stedman, Member of the Legislative Council for Portland Parish, announced in the Council that he had collected a sum of money which he would be glad to hand over to the Government towards the equipping of a children's ward in memory of the late District Medical Officer Dr. George. The gift was gratefully accepted by Government, and arrangements will be made to equip one ward with cots and turn it into a children's ward.

25. *Port Maria.*—A small children's ward will also be instituted, I hope, at Port Maria hospital in one of the small wards. The matter depends solely on obtaining the cots.

26. *Accommodation for Nurses.*—In some of the hospitals there is practically no accommodation for nurses.

27. Outpatient Departments with Hospitals. The returns from the various hospitals are as follows:

Hospitals.	1915-16. No. seen.	1916-17. No. seen.
Morant Bay	687	1,180
Hordley	707	1,137
Port Antonio	1,831	1,376
Buff Bay	909	1,067
Annotto Bay	12	21
Port Maria	660	695
St. Ann's Bay	780	541
Cave Valley	47	68
Falmouth	522	398
Ulster Spring	86	91
Montego Bay	2,572	2,740
Lucea	2,013	2,033
Sav.-la-Mar	187	227
Black River	1,164	1,921
Mandeville	344	380
Chapelton	428	516
Lionel Town	313	448
Spanish Town	2,744	2,625
Linstead	761	633
	16,767	18,088

28. Return shewing the number of patients treated under the Ticket System.

Parish.	1/	2/	3/
Kingston	594	257	—
St. Andrew	—	26	—
St. Thomas	—	11	2
Portland	—	6	—
St. Mary	—	76	—
St. Ann	—	40	—
Trelawny	—	—	—
St. James	—	2	—
Hanover	—	—	—
Westmoreland	—	27	1
St. Elizabeth	—	4	—
Manchester	—	3	—
Clarendon	—	5	—
St. Catherine	—	2	—
	594	439	3

29. District patients seen. The returns are as follows for the present and the 2 previous years:—

	1914-15.	1915-16.	1916-17.
Constables	2,687	2,794	2,919
Prisoners	5,394	5,222	1,396
Paupers	6,152	8,767	10,664
Imminigrants	24,809	16,261	13,238
Par. Midwifery cases	116	124	91
Casual Paupers	9,896	7,880	8,539
Coolie midwifery cases	17	19	21
	49,071	41,067	36,868

30. *Public Hospital, Kingston.*—During this last year the absence of Isolation wards has been severely felt.

On several occasions cases of chicken pox and measles have appeared among the nurses and patients, and had it not been for the Travelling Dispensary tents which were called into requisition there would have been no place to isolate such cases.

Bumper Hall has been in the hands of the Military for some months and consequently that building has not been available.

The Government really requires an Isolation Hospital of its own to which it can send its infective cases at any time as the isolating of them in tents within the grounds is a distinct source of danger.

31. *Dispensary School.*—Some time back with a view to obtaining a better class of dispensary student the Educational certificates required of them was raised. At present a student must have passed the Junior Cambridge Examination (with Latin included) or its equivalent. The only result is that instead of having 16 or 18 students at the Hospital as formerly we have some 5 or 6. Of these, two are ladies.

32. *Medical Council.*—During the year 9 candidates presented themselves for examination for permission to Register in the Island. Of the above 5 failed to pass the examination.

The Medical Council also addressed a letter to the Government recommending:—

(1) That section 14 of Law 49 of 1908 should be amended so that only those persons (not entitled to register here) who hold Diplomas from Colleges recognised by the Governor in Privy Council on the recommendation of the Medical Council shall be allowed to present themselves for examination and to register in this Island.

(2) That section 23 of Law 49 of 1908 be amended

(1) so that no unregistered person may practise.

(2) by striking out the two subsections so as to close up every loophole that allows either of unqualified practice or of the treatment of "simple ailments" over the counter.

33. *Helping the Contingents past and present*—I have much pleasure in recording the fact that much medical recruiting work has been done voluntarily by the Medical Officers and acting Medical Officers of the Department—while many examinations of returned invalids have been voluntarily made by the same officers, only one or two having demanded fees.

Much voluntary work in making examinations of invalids for temporary assistance has also been done by the Medical Officers attached to the Public Hospital, Kingston, and although many Medical Officers who have not gone to the war, much as they would wish to have gone, have not gone because they cannot be spared, still one must remember that home duties have to be carried on and someone must perforce stay behind to carry them out.

34. *Bumper Hall Hospital.*—On 11.7.16 the above Hospital, with the permission of the Mayor and Council, was opened for the reception of measles cases from the contingent Camp and on August 4th there were no less than 79 cases in residence including measles cases and contacts also one case of chicken pox.

These cases were under the care of the acting Supernumerary Medical Officer, Dr. Anderson, while Dr. Ross and I paid frequent visits.

Food and Equipment was supplied by the Public Hospital Kingston.

In all 103 cases were located in Bumper Hall Hospital on that occasion of which 13 were extremely bad cases of pneumonia or broncho-pneumonia.

Three of the nurses employed developed measles.

Had it not been for the timely use of Bumper Hall there would have been great difficulty in housing these cases of measles at Camp.

Swallowfield Camp, 7th June, 1917.

Sir,

I have the honour to submit the following short summarized report of the working of the Bumper Hall temporary Military Hospital under my charge as from the 12th January, 1917, to June 4th 1917.

The Hospital was opened under my care from the first mentioned date in consequence of an outbreak of measles occurring amongst the men of the contingent at Swallowfield Camp.

The Hon. S.M.O. kindly undertook to furnish the nursing staff and the other necessary attendants.

Up to June 4th a total of 505 admissions were recorded in addition to well over 200 contacts.

The Nosological table of the cases is as under:—

Chicken pox	..	..	..	5
V.D. Cases	..	..	..	1
Rheumatism	..	..	..	2
Asthma	..	..	..	1
Epilepsy	..	..	..	2
Coryza	..	..	..	2
Peritonitis	..	..	..	1
Tonsillitis	..	..	..	5
Laryngitis	..	..	..	1
Pneumonia	..	..	..	153
Malaria Fever cases	..	..	..	259
Pleurisy cases	..	..	..	5
Bronchial cases	..	..	..	6
Lagrippe cases	..	..	..	18
Measles cases	..	..	..	26
Mumps cases	..	..	..	4
Entero Colitis	..	..	..	6
Diarrhoea	..	..	..	2

Many of these cases were of a very severe type of their class and it is perhaps some little source of gratification that the death rate amongst them works out at less than 4 per cent.

On representations being made as to the desirability of rendering the windows and doors of the wards mosquito proof, the suggestion was very promptly acted upon.

The wisdom of this step manifested itself in the immediate large reduction in the number of cases of malarial fever amongst patients and employees. The situation is not by any means an ideal one for a Hospital, being on the windward side of the City cemetery; the surroundings consist of rank vegetation and the equipment leaving very much to be desired.

The following improvements were therefore undertaken with a view to securing hygienic conditions.

1. A new absorption pit (in place of the old one which was overflowing) to receive the sewerage from the wards.

2. Several shower baths and wash basins were installed.
3. The installation of a urinal with the necessary drainage.
4. A pit closet with accommodation for two was built.

The Commissary arrangements have been discharged by the Warden of the Kingston Hospital and the entire absence of complaints in respect to the running of the above is testimony to the efficient manner in which this work has been carried on.

In conclusion I have to record my appreciation of the willingness of the whole staff to, at all times, carry out my instructions to secure the greatest usefulness of the Hospital.

I have, etc.,

(Sgd.) J. CAMERON, P.M.O., J.W.C.

Hon. S.M.O., Kingston.

35. *Proposed New Law.*—During the March Session of the Legislative Council a Bill was introduced providing for the Notification of Still Births between the 28th week of pregnancy and full term. The bill was however withdrawn.

36. During the year 1916-17 6 spring bedsteads were issued to the Mandeville Public General Hospital.

37. GENERAL SANITATION.

(Synopsis of reports).

Annotto Bay.—Waste Matter—There is a dumping or deposit ground situated on Gibraltar Estate a quarter of a mile outside the limit of the town on the Fort George Road for the disposal of night soil.

Latrines—Bucket system. Emptied according to Sections 1, 2 and 3 of the town on every third night, but Public buildings such as the Public Hospital, the Police Station and the Parochial Latrine are attended to nightly. From October 1916 to March 1917, 21 new latrines have been installed of the whole number 8 are accessible to birds. There are no screened latrines here but the trap doors work well as regards flies.

Drainage—There is none but the swamp lands adjoining the town are being reclaimed effectually, though slowly, by the respective owners.

Overcrowding—Still exists but this is due to poverty and the scarcity of money from the condition of the labour market.

Yards and Compounds—Have been visited from time to time and the usual instructions given to the inhabitants as regards emptying utensils such as tins and shells, etc., as to their being destroyed or kept turned down so as to prevent any collection of water which may eventually be the breeding place of the anopheles or stegomyia, the varieties that abound here about. Kerosene oil has been used to some extent but mainly in the gutters and blocked trenches leading into the various rivers or ponds.

Mosquito breeding—The chief mosquito breeding place is a lagoon known by the name of Miss Fred's River. It is mostly stagnant and great difficulty exists in keeping it discharging into the outlet of the Pencar River which passes into the sea consequently it often overflows its banks and floods the surrounding lands and on its recession leaves a deposit of mud and rank decomposed vegetation with just a little water forming a suitable site or breeding place for the mosquito.

Sanitary Improvements—Apart from the instalment of the sewerage at the United Fruit Coy's premises and that of the Colonial Bank no new improvements have been made by the Local Board of Health only private individuals unless the bucket system of latrines be taken into consideration.

Adelphi.—Waste Matter—No arrangement is made for the disposal of waste matter (including night soil) and no dumping grounds exist as far as is known.

Latrines.—They are few and far between and when they exist are on the surface and are generally filthy. They are not fly proof and are open to the depredations of bird and beast.

Sanitary Improvements—None known of.

Buff Bay.—Waste Matter—Is collected by the Parochial Board carts and carried to the dumping ground situated at Woodstock except where the material is the waste matter is requisitioned elsewhere for the purpose of filling up land, etc.

Latrines—In the towns of Buff Bay and Hope Bay these are chiefly of the pit closet variety—except in the case of a few of the better class residents and of the Government Institutions where the Bucket system is in use—elsewhere the surface variety. By far the greater part of these closets are not fly proof and this accounts for the endemic existence of Enteric fever. Some of the closets are open to the depredations of birds and beasts.

Drainage.—There is very good provision for drainage in Buff Bay by open concrete gutters draining directly or indirectly into the sea. The villages around are naturally drained owing to their hilly nature, except in the cases of Hope Bay, Orange Bay and Charleston which are badly provided for in this respect.

Overcrowding—Does not exist to any great extent having regard to the fact that there has been a large exodus of former residents in answer to the call of King and Country and in search of employment in Cuba and Central America.

Compounds and yards—Are for the most part kept clean. It is unfortunate that the custom of keeping horses and other cattle in the immediate neighbourhood of their homes should be so prevalent on the part of residents.

Mosquito breeding places—There is less incidence of Malarial Fevers in the year under review which would indicate that the people are being educated up to the necessity of care in the disposal of old cans, etc., around their homes.

Sanitary Improvements—None known of beyond the requirements by Bye-laws for the proper examination of bread makers and sellers, butchers and bakers.

Black River.—Waste Matter—Is disposed of into the sea. There are no dumping grounds.

Overcrowding—Present in suburbs among poor.

Mosquito breeding places—Every facility is afforded the mosquito both in puddles in yards and in the great swamps adjacent. No measure taken to combat the nuisance.

Latrines—Surface—Majority. Bucket and pit comparatively few. It is hard to convince the people even among the educated class that dry earth is better to cover the excreta than ash which is used extensively.

Sanitary Improvements—None known of.

Balaclava.—Sanitary conditions remain the same.

Cave Valley.—Waste Matter—This is deposited on a vacant lot kept for the purpose adjoining Brown's Town. Night soil is buried in the premises in some cases in others on adjacent lots.

Latrines—Most of the premises have them. Some surface ones in Brown's Town still but most commonly in the villages. Buckets are used in the schools, Public Offices and Hotel in Brown's Town. In the villages many persons have no latrines at all some are open to depredations of beast. But by instance of the M.O.H. and Sanitary Inspectors holes and trenches are being more commonly used and can be easily covered with earth.

Drainage—Is good—entirely surface except at one street crossing where it is underground.

Overcrowding—Not to any great extent generally but exists in some of the smaller houses in the villages.

Compounds and yards—Kept clean generally, but only with the frequent visits of Sanitary Inspectors.

Mosquito Breeding Places.—About Cave Valley and along river courses, especially in stagnant pools caused by the overflow of the river and ditches in rainy seasons.

Claremont.—Waste Matter—Is burnt and buried in old marl pits used as dumping grounds near the villages. Night soil is buried.

Latrines.—Mostly pit, at the police station buckets are used with dry earth.

Drainage.—Natural.

Overcrowding.—Still exists. But the premises are being generally kept better.

Chapelton.—Waste Matter—The disposal of this remains the same.

Latrines—No improvement.

Drainage—Has been improved by concrete drains laid along the road past the Police Station.

Sanitary Improvements—None carried out by the responsible authority.

Crofts Hill.—Waste Matter—Is disposed of on the lands adjacent to the yards of the houses. Night soil is also buried in the adjacent lands. No dumping ground exists.

Latrines—Are far and few between. A few of the surface variety are to be found in the villages. Some of the better class residents and the police use the bucket system. The remainder are on the surface system and the police at Point Hill use the pit system. Where buckets are used they are protected though perhaps not entirely fly proof.

Drainage.—Surface.

Overcrowding—Exists to a great extent.

Compounds and yards—Are as a rule kept clean and tidy.

Mosquito breeding places—Have not called for any attention.

Duncans.—Waste Matter—No dumping ground exists.

Latrines—Generally of the surface system where used. None are fly proof. Most of them are protected from birds and beasts.

Overcrowding—Exists generally everywhere.

Compounds and yards—Have improved a good deal since the advent of the New Law.

Mosquito Breeding Places—These are generally barrels of water, old cans, water holes, etc. Measures are being adopted to control these breeding places such as keeping barrels covered stopping up water holes, etc.

Sanitary Improvements—None made.

Falmouth.—Waste Matter—Is used for filling swamps to the northwest of the town of Falmouth. Night soil is removed and dumped into the sea out of town limits.

Latrines—Surface closets still exist in the town and country parts. Buckets are used in a few places. Pits are in general use in the town and are being erected more and more in the country parts.

Drainage.—More concrete side tables are absolutely necessary, but the authorities complain of want of funds and the exigencies of the war.

Overcrowding—Very limited.

Compounds and yards—In fair order.

Mosquito breeding places—Crab holes and a few old time sinks in the town.

Sanitary Improvements—None, due to the war.

Gordon Town.—Waste Matter—The roads are swept regularly and the waste matter collected in public receptacles, carted away and burnt.

Latrines—Both the bucket and pit system are in use. The pit and surface latrines are plentiful in outlying districts, and are open in the majority of instances to flies.

Drainage.—Natural surface. Owing to the hilly nature of the district.

Overcrowding—Is general.

Compounds and yards—Are kept fairly clean and there is a general tendency towards improvement in this respect.

Mosquito breeding places—None.

Gayle.—Waste matter—Burnt, buried or thrown on the fields. No dumping ground exists.

Latrines—Fairly well supplied; the number of surface latrines is on the decline. Very few places are now without any latrine.

Drainage—Natural.

Overcrowding—It is really wonderful the number of people one of the huts will accommodate.

Compounds and yards—Kept fairly well. There is a tendency to cultivate too near to the house.

Mosquito breeding places—These abound. It would be an enormous task to attempt to remove or control these.

Grange Hill.—*Waste Matter*—Is thrown on the lands near by and is used as manure.

Latrines—All of the surface type, and are all open to birds and beasts.

Drainage—Is surface.

Overcrowding—Can hardly be said to exist.

Compounds and yards—Condition very much improved.

Mosquito breeding places—Abundant opportunity afforded for the formation of puddles in which mosquitoes can breed.

Hagley Gap.—*Waste Matter*—The disposal of waste matter is generally left to nature. There is no dumping ground.

Latrines—Where existing they are usually of the surface or bucket system.

Drainage—Is excellent usually owing to the hilly condition of most of the district.

Overcrowding—Very prevalent.

Compounds and yards—Generally good.

Mosquito breeding places—Not aware of any measures taken to remove or control breeding places of mosquitoes.

Hordley.—*Waste Matter*—No dumping ground exists for waste matter.

Latrines—Have been more in evidence recently. They are usually of the surface or pit system, but in a few instances buckets are used. The former are more often than not open to depredation of bird and beast.

Drainage—Surface.

Compounds and yards—Are kept a little cleaner than formerly.

Mosquito breeding places—Still abound. No measures taken to remove or control them.

Lower St. Andrew.—*Waste Matter*—The streets in the Halfway Tree district are swept daily and the refuse removed by Sanitary Department carts to the public dumping ground. This is situated at Maxfield Park on the old Pound Road and is outside the limits of the town of Halfway Tree.

Night soil is removed from the pit closets and buried on the property which consists of three acres or more.

Latrines—The pit constitutes the chief system. There are a number of surface closets in outlying districts.

The Bucket system is made use of only by Government Departments. The surface closets are exposed to the depredations of bird and beast.

Drainage—The large open drain on South Camp Road has been extended further to the north and a small piece laid down on the Brentford Road as far as Whitehorn's bridge.

Overcrowding—Exists to some extent.

Breeding places of mosquitoes—Do not exist to any great extent.

Sanitary improvements—Very little has been done during the past year, but attention has been paid to maintaining in good order the existing sanitary arrangements.

Lucea.—*Waste Matter*—Is disposed of by being burnt or thrown into the sea and for filling up swampy lands. There are no dumping grounds in my district.

Latrines—Are of the surface, bucket and pit system. None are fly-proof.

Drainage—There are concrete drains in Lucea, Green Island and Sandy Bay. The outlying villages are not so provided.

Overcrowding—Does not exist to an alarming extent.

Compounds and yards—Have been kept in fair condition.

Mosquito breeding places—In swampy lands along the sea coast and inland. In the town of Lucea kerosene oil is generally applied to stagnant pools in which mosquito larvae are found.

Sanitary improvements—Concrete drains have been laid down by the Local Board of Health in Lucea on the parochial roads leading to the Baptist Chapel and Houghton Court, also on the main road "by the rocks."

Little London—Conditions remain the same.

Lambs River.—*Waste Matter*—Is either burnt or deposited in some suitable place. There are dumping grounds.

Latrines—Are of various kinds. The majority are of the surface system, and are open to depredations of bird and beast. The other varieties are of the pit and bucket system and are protected.

Sanitary improvements—None.

Lionel Town.—*Waste Matter*—Dumping grounds are located out of the town on waste lands and cemeteries.

Latrines—In most of the districts, they have improved, but there are still many surface ones that need protection from birds.

Linstead.—*Waste Matter*—No dumping grounds.

Latrines—Some attention has been paid to the proper providing of latrines, but they are not fly-proof.

Drainage—Surface by side drains and water tables.

Overcrowding—Still exists.

Compounds and yards—Except in Linstead no attention is paid to keeping of compounds and yards by the average householder.

Breeding places of mosquitoes—No measures have been taken to remove or control the breeding places.

Sanitary Improvements—None.

Morant Bay.—Waste Matter—Is disposed of by dumping to the west of the town. Night soil from the Public Institution is deposited in that direction also at the mouth of a river.

Latrines—Are generally of the surface or pit type. During the year a private corporation installed conveniences on the absorption pit system which works admirably.

Drainage—Surface.

Overcrowding—No evidence of any.

Compounds and yards—Some effort is made to keep them bushed.

Montego Bay.—Waste Matter—This is carted away to dumping ground and burnt. Night soil is carted in a zinc lined cart and deposited into large vats covered with dry earth and after many weeks disposed of for manure. The dumping ground is in the Catherine Hall lands outside the town limits.

Latrines—There are about 80 sanitary latrines with Absorption pits, these work very well and are being installed wherever possible. As far as possible all the town latrines are protected from flies.

Drainage—Surface.

Overcrowding—Still exists to a great extent both in town and country.

Compounds and yards—Are still in fair condition.

Mosquito breeding places—Very prevalent during this year.

Sanitary Improvements—A few concrete drains have been laid down.

May Pen.—Waste Matter—Is removed bi-weekly by a man with a hand cart, taken to the dumping ground and burnt.

The dumping ground is within the limit of the town.

At Four Paths and the other villages nothing is done in this respect.

Latrines—The bucket system is gradually replacing that of the surface. These buckets are cleaned frequently, but are not fly-proof and in some instances are open to the depredations of bird or beast.

At Four Paths the system is chiefly of the surface system.

Drainage—Natural surface drainage both at May Pen and Four Paths. Where the surface is flat water collects in ponds and pools and remains until evaporated.

Overcrowding—Noticed to a large extent among the peasants.

Compounds and yards—Not in a satisfactory state and still a neglect exists to bush and clean the yards and surrounding lands.

Mosquito breeding places—There has been an appreciable decrease in the number of mosquitoes when compared with 1916. This has no doubt been due to the filling up of two large ponds which are situated within the limit of the town. The majority of the mosquitoes are however *stegomyia*. Not sufficient attention paid to the taps in the yards to prevent pools of water and which act as breeding places.

Sanitary improvements—The filling up of two ponds which are in the vicinity of the town.

Newport.—Waste Matter—There is no special system for the disposal of waste matter. No dumping grounds known of.

Latrines—Surface.

Drainage—There is no particular system in the district.

Mosquito breeding places—Very few places exist.

Old Harbour.—Waste Matter—The refuse is collected daily by carts and used for filling up insanitary depressions. Night soil is buried in the vicinity of the closets whence it is taken. There is a dumping ground situated outside the town of Old Harbour.

Latrines—The system is a mixed one. All closets are now protected against small stock and fowls. The earth closets are fly proof if sufficient earth be used. The work of protecting existing closets and building new ones in the other villages and districts is being proceeded with, but the appointment of an Inspector of Nuisances for the District of St. Dorothy is necessary for its speedy performance.

Drainage—By cement gutters.

Overcrowding—There is very little overcrowding, and new modern houses are springing up throughout the district.

Compounds and yards—Are regularly inspected and steps are taken to remedy any nuisance as soon as it is discovered.

Mosquito breeding places—Crude petroleum is stocked and applied to any temporary collections of water after heavy rains. The cement rain water gutter on the Mountain Road has been continued as far as Aynstey on the same side of the road.

Port Maria.—Waste Matter—No change. At Port Maria there is a daily collection of house refuse and street sweepings. There is a dumping ground on Trinity Estate outside the limits of the town.

Latrines—The bucket system has been adopted in Port Maria and is still in use giving good results. Chiefly of the Bucket system. There are also some surface and pits. None are fly proof, but many of the newer latrines could easily be made so. At Oracabessa and other settlements open and surface closets are the only latrines in use.

Drainage—Surface drainage is bad in Port Maria owing to adverse natural conditions but much improvement is still being effected in this respect by continual filling in of yards and drainage of swamp lands.

Overcrowding—Hardly exists to-day. This district is largely responsible for the high position which the parish holds in recruiting for the war contingents and this with the scarcity of work and the trekking of the labourers to Cuba and elsewhere accounts for the change in the yard rooms and the barracks on estates. Overcrowding of course will always be found in the two roomed huts in the poorer settlements. In this connection it is interesting to note that only seven cases of Pulmonary tuberculosis were notified during the year.

Compounds and yards—Show considerable improvement owing to continual filling in and also to better sanitary control.

Mosquito breeding places—These are usually increased after rains owing to the low level of the town, gradually being reduced as the incidence of malarial fevers amply proves.

Port Royal.—Waste Matter—The refuse of the yards and streets are collected by the town scavengers employed by the Parochial Board at stated times and conveyed in a hand cart to the dumping ground on the sea shore and burnt.

Latrines—These are a disgrace to the town. There is a public latrine. All the latrines in the yards are on the bucket system. Most of them are in a delapidated condition unprotected from flies, fowls or dogs. Owing to the overcrowding of the houses and small space available for yards the latrines are nearby to or right alongside the dwellings, and in many cases are adjacent to the streets and lanes of the town. Representations have been made by the D.M.O. to the Local Board of Health, but without avail, who is strongly of opinion that the Central Board should appoint a Commission to enquire and report upon the conditions at present existing. The buckets are collected and the contents emptied every night in the sea at the mouth of the harbour.

Drainage.—Surface.

Overcrowding—Exists in most of the tenement houses not only as regards the inhabitants but also as regards the buildings. The houses (for the most part in a state of disrepair) are jammed alongside each other leaving very little space for yards or open ground at the back or sides which are quite inadequate for satisfactory hygienic conditions.

Mosquito breeding—This matter receives attention and the breeding kept under control.

Richmond.—*Waste Matter*—Some of the waste matter is deposited on dumping grounds out of the towns but it is principally thrown in the nearby fields and gullies. In some places rubbish is collected and burnt.

Latrines—No regular system, and where latrines exist they are for the most part insanitary. Usually open places with the excreta deposited on the surface of the ground and accessible to depredations of bird and beast. Knows of none which are fly proof. The houses of a few people have the bucket system.

Drainage—Natural. The district being hilly storm water runs off rapidly.

Overcrowding—Exists in the houses of the poor people. Often large families occupy small huts of two rooms. They live however out of doors during the day time and by so doing considerably reduce the dangers due to overcrowding.

Compounds and yards—Have been kept in fair sanitary order throughout the year.

Mosquito breeding places—In pools along the banks of slowly running streams, in tanks and in collections of water and in trenches of banana fields.

Sanitary improvements—None known of.

Stony Hill.—*Waste Matter*—Road sweepings are dumped in the adjacent fields. Night soil is buried.

Latrines—Are of the bucket system. The rest of the district is supplied by pit closets.

The latrines in the Industrial school are roughly fly proof, the others are not. The great majority are not open to depredations of bird and beast.

Drainage—Surface.

Overcrowding—Still exists.

Compounds and yards—Are kept clean.

Breeding places of mosquitoes—Exist throughout the district.

Sanitary improvements—None have been made in the district by the Board, private individuals have erected or repaired latrines where required.

Sav.-la-Mar.—*Waste Matter*—The disposal of waste matter and all other matters connected with sanitation of the town and villages remain the same as they were last year.

Mosquito breeding places—The usual precautions against mosquitoes are taken.

Sanitary improvements—None known of.

Santa Cruz.—Sanitary conditions remain the same.

St. Ann's Bay.—*Waste Matter*—For the most part thrown into the sea. There is a dumping ground for St. Ann's Bay which adjoins the town.

Latrines—Of the bucket system, pit and septic tank. Not in his opinion fly proof. Not open to depredations of bird and beast.

Drainage—St. Ann's by concrete gutters.

Overcrowding—Present in about an equal average to the rest of the Island.

Compounds and yards—Conditions remain about the same.

Mosquito breeding places—Salem and Ocho Rios have swampy lands and the honey-combed rocks suitable for breeding.

Ulster Spring.—*Latrines*—Numerous latrines have been erected and old ones repaired. Generally the pit system is employed, the bucket system being adopted only in Public Buildings.

Drainage—Is by main roads drains only.

Mosquito breeding places—The nuisance shews abatement. Stagnant pools and other breeding places for mosquitoes have been drained and casks containing water covered in many cases have been removed from the compounds.

Kingston, 24th April, 1917.

Sir,

I have the honour, in response to Circular No. 1501 of the 31st ultimo, to submit the following report which forms an epitome of the sanitary history of this—the Kingston—Medical district for the financial year ended 31st March, 1917.

Last year I began my remarks with an expression of the pleasure I then felt at being in a position to chronicle a year of satisfactory health conditions, and one which in view of its improvement on its predecessor, seemed to offer a still better health outlook for 1916-17. This anticipation has, I regret to say, not been realized. On the contrary, the period under review furnishes one of the most sombre pictures that medical Kingston has produced for many years, as far as my experience goes—both the morbidity and mortality returns tell a gloomy and highly unsatisfactory tale. The death rate per 1,000 of population shot up at a bound from 25.36 in 1915-16 to 34.12 in 1916-17, and sickness was prevalent throughout the whole twelve months culminating in March when the death registration reach the enormous figure of 61.50 per 1,000.

One disease—Malaria—has given somewhat of a shock to many of us who have been more or less under the impression that it had been practically stamped out of Kingston. Not only was its incidence abnormally high, but it claimed as many as 61 victims, as compared with 22 and 34 in the two preceding years respectively. These figures speak for themselves and bring out into bold relief the results of the regrettable circumstances which brought about the abandonment of the operations of the late Malaria Commission.

That the work of some such agency is urgently required, cannot be gainsayed. I have no hesitation in saying that if Malaria is to be controlled and successfully dealt with, relentless and unremitting war must be waged against the mosquito—cheap half-hearted, desultory methods won't suffice—every mosquito breeding place must be sought out and destroyed, and the formation of new ones prevented. The selling of quinine at Post Offices is only an incident in the campaign, and a minor one at that.

Enteric Fever—329 cases of Enteric Fever with 61 deaths were registered as compared with 258 cases and 47 deaths in the previous year. Here again progress is in the wrong direction.

Phthisis.—The figures under this head show the usual upward rise as compared with the previous year—266 cases with 156 deaths in 1916-17, and 228 cases and 133 deaths in 1915-16.

Bowel Complaints—were also more prevalent during the year under review as compared with its predecessor 228 to 187.

Pneumonia—of all the serious diseases this shows the most appalling and phenomenal rise, and was at the end of the year (March) practically epidemic. I shall quote the figures for the three years past:

			Notifications.	Deaths.
1914-15	..	..	65	56
1915-16	..	..	69	51
1916-17	..	..	307	114

What is the explanation?

The Medical Officer of Health for Kingston in his report to the Mayor and Council for January suggests the "possibility of a virulent strain of *Pneumococcus* having been introduced from Halifax by home coming convalescents of the Third Jamaica Contingent." Personally I am not prepared to go so far afield to look for the cause of the trouble. I think the two main, if not sole factors, are to be found in meteorological conditions and poverty, both combining to lower the vitality and restrict the resistive powers of the community. This idea is borne out by the increased incidence of the disease during the last (March) quarter of the year concurrently with the violent diurnal changes of temperature (cold nights following hot days) that obtained during those months. The role played by poverty involving insufficient food if not actual starvation, and scanty clothing is obvious. Be the cause what it may there can be no doubt that the prevalence of *Pneumonia* in the city is a serious matter.

The sick rate among the paupers whose numbers have been mounting up by leaps and bounds has been very high—I quote the following figures for three years:—

Year.	Number treated.	Prescriptions dispensed.
1914-15	2,256	4,187
1915-16	3,197	5,885
1916-17	3,577	6,455

Poverty was more in evidence during the year under review than in any former period as far as my experience goes and is undoubtedly a distant reflection of the war.

Infantile mortality was as usual distressingly high. The intention of a movement to deal with this most important matter is a commendable step and it is to be hoped that the child-saving league will receive the support which it deserves. It has a large field before it ripe for the harvest.

Water Supply—There are three sources all of which are liable more or less to pollution, but this defect is amply compensated for by the efficient filtration to which the water is subjected before delivery to the consumers. The Kingston General Commissioners serve the community well in this respect. The quantity of water is unlimited.

Dumping Grounds—There are two dumping grounds in the neighbourhood of the city, one to the west at Kingston Pen, the other to the east at Jackson Road, where refuse matter, etc., are dumped.

Latrines—The city is served by the water carriage and pit closet system of sanitary convenience, the one as satisfactory as the other is disgusting and dangerous. I have on previous occasions recorded my opinion of these abominable privies which I should be glad to see eliminated entirely from the city. They are being superseded by the Water Closet system but very gradually. No attempt is made to render the pit closet flyproof.

The yards and compounds are, speaking generally, kept clean and tidy; but there are some notable exceptions which can bear improvement.

In spite of the vigilance and energy of the Officers of the Sanitary Department of the Mayor and Council, breeding places of mosquitoes must exist to judge from the prevalence of Malaria. The people, many of them at all events, fail to co-operate in the crusade against these insect pests, from apathy or ignorance. A little stimulation in the way of a fine will probably have to be resorted to.

Sanitary Improvements—No sanitary improvement worthy of special notice was made during the year, as far as I am aware.

Mortality Rate—The mortality rate was, as already stated, very high, comparing most unfavourably with the two preceding years 27.23 and 25.36 respectively, the highest rate being in the January to March quarter.

Meteorological Conditions—The rainfall for the year 47.22 was slightly less than that of the year before, but still was a generous one for Kingston. The humidity in November was very marked and had an adverse effect on the public health, in bringing on catarrhal attacks on the respiratory and digestive systems of the young and aged.

Such minor infective diseases as Measles, Whooping Cough, Chicken Pox, etc, endemic in Kingston were more or less prevalent, but as they have only recently been made compulsorily notifiable, data for accurate comparison are wanting. I have no reason, however, to believe that they were abnormally prevalent or unusually severe.

Vaccinations—1,050 persons were successfully vaccinated by me. Vaccinations were also performed by private practitioners.

Yaws—This disease does not prevail in Kingston to any extent. I saw five cases in all; of whom two came from St. Andrew.

Pellagra—This disease seemed to be on the increase. I saw 21 cases, 4 of whom died, during the past year, as against 4 cases and 1 death in the previous year. I have reason to believe that my experience in this respect is not singular. These patients live in the poor parts of the town but are not confined to any particular locality.

Leprosy—Two cases came under my observation, and as they were unable to provide themselves with the proper means of isolation they were sent to the Leper Asylum.

Dysentery—Dysentery has not been prevalent.

Vomiting Sickness—No cases of ackee poisoning or Vomiting Sickness came under my observation during the year.

Venereal diseases—and their complications and sequelae were as much in evidence as ever.

I have, etc.,

LAWSON GIFFORD, D.M.O.

The Suptg. Medical Officer,
Kingston.

Port Antonio, 27th April, 1917.

Sir,

I have the honour in reply to circular 1501 dated the 31st ultimo to submit the following dealing with health conditions obtained in my district during the past financial year.

The year luckily, in view of the depressed condition of trade and the consequent absence of money was an unusually healthy one.

An increase in the number of cases of malarial fever, began to show itself in August and reached its maximum in October and November, to be followed by an abrupt fall during December. The total number of admissions to Hospital for this cause during the year was 434, this small number as compared with former years can of course be largely accounted for in connection with admission of coolies to the Hospital. No new coolies have been imported and those already located in the district are by this thoroughly acclimatised.

The admissions to Hospital during the past four years for malarial fever are as follows:—

1913-14	..	..	..	..	892
1914-15	..	..	..	..	1,710
1915-16	..	..	..	..	743
1916-17	..	..	..	..	434

The type of fever met with has been generally mild in character; this is evidenced by the fact that the death rate in Hospital from this cause has been under 1%

A report on the sanitary condition of the chief towns and villages of my district is practically a report on Port Antonio alone, as I am not aware that any special attempts are made to carry out sanitary measures in any of the villages of the district.

The remarks in my report of the 25th April, 1916, apply in answer to the second paragraph of the circular under review. The water supply was abundant during the entire year and the quality was all that could be desired, except on one or two occasions when, after a heavy fall of rain, a considerable quantity of earthy matter appeared.

The remaining sub-divisions of the second paragraph of your circular are fully dealt with in my report for last year there are no new features to be added.

Excellent work has been done by the Titchfield Trust in filling up their swamp lands to the Eastward of the town, streets have been laid out and were in process of metalling at the expiration of the year.

I regret in connection with the laying out of new streets that no attempt is made to provide side walks. The awkward position of affairs owing to the absence of side walks must be apparent to every one in connection with West Street. Why perpetuate similar conditions in laying out new streets? From a sanitary point of view streets cannot be too wide, and the safety and comfort to pedestrians when a portion of the roadway is reserved for their exclusive use, cannot be exaggerated.

The only sanitary improvement undertaken by a Public body is the construction of concrete water tables along French Avenue. To the Westward of the town the United Fruit Co., have been filling in their swampy lands, and generally improving the appearances of their property.

It does not seem to me that the seasons had any appreciable effect on the death rate. The deaths registered in the Port Antonio Registration Office during the past three years are as follows:—

1914-15	..	..	..	..	324
1915-16	..	..	..	..	350
1916-17	..	..	..	..	320

As I remarked in the earlier part of this report, the year was an unusually healthy one, this however does not account altogether for the small number of deaths registered. There is no doubt in anyone's mind that the population of the town has decreased considerably during the past year or so in fact since the hurricane of 1915 so that the smaller number of deaths registered may in a large number be due to this.

The only meteorological condition of any importance that is likely to have had any effect on public health was the hurricane of August last. That this event had no effect, is borne out by the fact, that the number of deaths registered for the September quarter was considerably less than that registered during the preceding or subsequent quarter of the year.

There has been no serious outbreak of any particular disease, exception might be taken to this statement inasmuch as there has been a marked increase in the number of cases of Tuberculosis notified, the figures for the past year and the two preceding years are as under, I also give the number of cases of Enteric and Pneumonia registered.

	1914-15.	1915-16.	1916-17.
Pulmonary Tuberculosis ..	43	42	72
Enteric Fever ..	29	35	35
Pneumonia ..	21	11	17

This I can only account for as being due to privation, resisting powers lowered owing to the absence of proper food.

Vaccination was confined to the town of Port Antonio, 336 children having been vaccinated. Children are well protected but in the case of adults it is doubtful; of course they were all vaccinated during infancy but secondary vaccination is practically unknown.

As regards the prevalence of Yaws 374 cases were treated in the Hospital by means of one of the Salvarsan preparations, 18 others were given a dose and sent home, and a number were treated by the old method as out door patients, so that it is safe to say that Yaws is extremely prevalent.

The treatment (in the case of the 374 cases treated in the hospital) was on the lines mentioned below. One of the Salvarsan preparations was given in each case in all 424 injections were given.

Intravenously ..	152
Intramuscularly ..	252
	<hr/> 424

Sixteen patients were given an injection and allowed to return home immediately thus leaving 408 injections given to 372 patients. The following preparations were employed

8 patients had	Diarsenol
6 “	Salvarsan
59 “	Galyl
187 “	Kharsivan
216 “	Arsenobenzol-billon
<hr/> 424	

As regards the relative merits of the different preparations, I found that Diarsenol gave excellent results. It is more soluble than any of the others named above, and pain and swelling at the seat of injection very rapidly disappeared. The cases treated with it were all very severe cases of general yaws in children it was marvellous the rapidity with which the symptoms disappeared.

Galyl was sent to me in only emulsion for intramuscular injections and was used almost exclusively in the treatment of children, the results obtained were good. The difficulty I experienced with it was to regulate the dose, it was troublesome to get it out of the ampoule, at least one-third of each dose remaining behind, the trouble did not end with getting the dose into the syringe; owing to its consistence, it was impossible to get it to run through the needle. I ultimately hit on the plan of emptying the contents into a mortar, adding a small quantity of Olive oil and after rubbing it up properly I had no difficulty in getting it to go through the needle.

Kharsivan I thought more toxic than the others, several cases of Jaundice developed and several of the persons treated had gastric intestinal symptoms.

Arsenobenzol was used more extensively than any of the others, not because it was thought to be a better preparation but because it was the one supplied most frequently. The results were uniformly good and no toxic symptoms occurred, in any of the persons treated.

Intramuscular injections were given to persons suffering from Yaws ulcers where weeks in any case would be spent in the hospital, during which the drug would have ample time to become absorbed.

Intravenous injections have to be given very carefully and I find that on an average it takes about half an hour to give a dose, in acute cases the intravenous is much the better, as a general rule you can send your patient home within 48 hours of getting his dose or if he happens to live near and can afford a conveyance he can go home the moment he leaves the table. The Hospital is saved a considerable amount for maintenance when this can be done.

As regards repeating the dose this has been necessary in a fair number of cases, one child a girl of eight who has been ill for three years suffering from Yaws, has had no less than five doses. The majority are however better after the first or at most the second dose. It is a question of course when a patient having been apparently cured returns several months later suffering from acute symptoms, whether it is not a fresh infection.

Hookworm is generally prevalent as mentioned in previous reports. 168 cases were treated in the Hospital, in each case a microscopic examination was made in order to verify the diagnosis. A number of cases presenting all the familiar symptoms of ankylostomiasis were seen outside, it was impossible to make a microscopic examination in those cases, two deaths only have occurred directly traceable to hookworm infection, one a coolie and the other a creole.

I have seen no fresh cases of leprosy, one very chronic case terminated very fatally in the Poorhouse last year since when none has been seen.

Very few inmates of the Poorhouse suffer from Hookworm, this is contrary to what one would expect but it is nevertheless a fact.

Pulmonary Tuberculosis was responsible for twenty deaths in the Poorhouse during the year. No case of the disease was contracted in the Institution.

Dysentery has been less prevalent, fifty cases of Amoebic dysentery were admitted to the Hospital and a few were seen outside as private patients. In the case of those treated in the Hospital microscopic examinations were made in nearly every case. The mortality resulting from dysentery has been low 2% only.

One case of Pellagra terminated fatally in the Poorhouse during the month of May last, this was the only case seen; the patient, a woman, had been an inmate for a number of years.

A post mortem examination was made in the case of two persons who died after eating ackees. In one the characteristic appearances, as described by Dr. Scott, were very apparent, the other was less definite. No other case so far as I am aware occurred.

Syphilis was rather more prevalent than during the preceding year, 47 cases of Primary syphilis were treated in the Hospital in addition to 15 tertiary, 8 secondary and one hereditary.

The salvarsan preparations were made use of extensively, 48 of the sufferers had an injection, 40 intravenously and 8 intramuscularly. The preparation used and the number of patients injected was as follows:

Salvarsan	..	..	..	1
Galyl	..	..	..	4
Kharsivan	..	..	..	11
Arsenobenzol-Billon	..	..	..	32
				—
				48

The primary cases all occurred among young people, it would appear to me to be on the increase.

Gonorrhoea is extremely prevalent. It is frequently followed by complications. I am not prepared to say that it is on the increase.

I think it right to place on record the following of the work done in the Hospital during the year.

Miscroscopic Examinations for hookworm	..	168
“ “ of sputum for Tubercle Bacilli	..	76
“ “ of blood for malaria	..	51
Number of Post Mortem examinations made in the case of persons dying in the Hospital	..	15
Number of persons treated with Gonococ Vaccine, i.e., number of doses given	..	43
Number of doses of vaccine given Staphs, Strepts, and coliform	..	155
Number of doses of Tuberculin	..	38
Number of operations performed in the Public General Hospital requiring the administration of a general anesthetic (chloroform exclusively)	..	186
Number visits paid to Estates on which coolies are located	..	42

I have, etc.,

C. A. MOSELEY, D.M.O.

Spanish Town, 3rd May, 1917.

Sir,

I have the honour to submit the following report on the health conditions of the Spanish Town Medical district for the financial year ending 31st March, 1917.

2. There has been an unusual amount of sickness and mortality. Influenza was very prevalent during the earlier part of the year—Measles in the latter part along with Typhoid Fever and pneumonia from January to March, 1917.

3. The rainfall for the year 1916-17, was as follows:—

April	2 inches	39 parts
May	13 “	83 “
June	2 “	24 “
July	2 “	06 “
August	10 “	01 “
September	4 “	53 “
October	19 “	47 “
November	12 “	57 “
December	0 “	05 “
January	0 “	31 “
February	0 “	12 “
March	0 “	36 “

4. The infectious diseases notified were:—

Phthisis	33 cases	
Enteric Fever	49 “	
Pneumonia	56 “	
Septicaemia	1 case	
Scarlet Fever	1 “	(quarantine station)
Poliomyelitis	1 “	

It will be noticed that Phthisis, Enteric Fever and Pneumonia were very prevalent.

5. The death rate has been higher than in former years. In the years 1915-16 there were 709 deaths and in 1916-17 there were 936 deaths. The mortality was at its highest during the last quarter of the financial year—384 deaths. In the month of March alone there were 160 deaths registered. Poverty, scarcity of food and neglected sanitary conditions are mostly the causes of this high mortality.

6. The sanitary conditions prevailing are not all that can be desired.

7. The water supply of Spanish Town is from the Rio Cobre River. The villages have tanks and ponds.

(b) an unlimited quantity is available.

(c) the water is kept from pollution.

(d) the reservoir is protected.

(e) there are public tanks in the Highgate district and also in the St. Johns District.

8. All waste matter swept from the streets and with the slush from the concrete drains, is left in heaps along the sides of the streets until they can be carted away. The night soil is removed from the Public Institutions in closed carts and buried. There is a dumping ground for all refuse matter, situated outside of the town limits. The system of Pit closets are mostly in use—Public Institutions have however the bucket system..

9. Overcrowding in tenement houses, among the poorer classes, exists to a very great extent. The compounds and yards are not kept as clear as may be expected. No special attention is being paid to the breeding places of mosquitoes, and there have been no special sanitary improvements noticeable.

10. The slaughter house erected some time ago has been overhauled and additions made but not yet been put in use. The old system of slaughtering cattle and small stock in yards still continues.

11. Vaccination has been carried on during the year.

12. Yaws has been treated by injections of Arsenobillon with great success in the St. Johns and Port Henderson districts.

13. The treatment to Hookworm in the several Public Institutions has been steadily carried out and returns submitted.

14. There were only 3 lepers found in the district. They were committed to the Lepers Home.

15. Dysentery has not been prevalent in the district.

16. No cases of Pellagra came under notice.

17. Ackee poisoning or so called Vomiting sickness has not been reported during the year.

18. I greatly regret to report that Syphilis is becoming very prevalent—the tendency of the people not only in this Island but in all parts of the world, is in favour of large towns and there they congregate and form the nucleus of all misery and villany that prevails.

The vagabonds from all parts of the Island locate on the banana plantations. No persons should employ a servant who is suffering from this disease. An experience of nearly 37 years points to the fact that venereal disease is fast spreading; miscarriages are no doubt due to syphilis, but very few cases come under treatment. Patent medicines, quacks and imposters who pose as Specialists are first resorted to and the unfortunate victim finally finds an asylum in the Poorhouse. It has been my misfortune during the many years of my medical duties to notice young healthy country girls come into the town seeking employment and after a short residence become total wrecks—gonorrhoea, Syphilis, pregnancy being accountable for their condition—young men with bright prospects have been infected, rendering them unfit for the performance of their vocations.

19. Infantile mortality is still high and will always continue till the moral tone of the people is improved. We can only hope for this by improved sanitary conditions, education, religious training and a better living wage.

I have, etc.,

J. H. PECK, D.M.O.

38. *Manning Home Report—*

Black River, May, 1917.

Sir,

I have the honour to submit to you my annual report for the Manning Home for financial year ending March 31st, 1917.

During this period I have treated 220 cases made up as follows:

Gastro intestinal disorders	..	..	100
Skin affections	..	..	25
Abscesses and ulcers	..	..	25
Anaemia	..	..	10
Ear affections 1 (injury) (slight) 1	..	..	2
Pellagra	..	..	3
Bronchial affections	..	..	55
			<hr/> 220

Stock remedies are kept on hand which are under the control of the Matron to be administered from time to time when the necessity for doing so exists.

Three cases of Pellagra recurred since the beginning of the year but which have yielded to the usual treatment. No new ones have occurred in the Institution nor any seen in the outlying districts.

For the past two years I have recommended a supply of warm clothing to be kept in reserve to meet the cold spells which occur during November to February but nothing has been done in this direction.

I would also urge on the Management the necessity of setting by a room which may be used as sick ward and not to allow the sick children to intermingle with the healthy ones.

The dormitories should be supplied with beds and the system of sleeping on mats placed on the floor be discontinued.

The health of the children continues to improve and their growth is marked. One is struck with the marked improvement in their physical appearance so unlike the emaciated wrecks they were when first admitted.

The daily attendance is between 54 and 56. No deaths since the opening of the Institution.

Very sick cases are removed to the Santa Cruz Almshouse.

The staff continue to give the same careful attention as in former years.

The water supply is good, constant and sufficient.

I have, etc.,

R. M. STIMPSON, D.M.O.

39. *Peculiar Sickness*—

Old Harbour, 16th April, 1917.

Sir,

In reply to your letter No. 544/1512 of 13th April, 1917, I have the honour to report that I have visited Guanaboa Vale and seen a number of cases of "sore mouth and sore tongue," all of which are convalescent.

2. Cases of this kind are seen every year scattered about the district during the months of January, February and March and I have always attributed them to the cold winds and dust which prevail at this season.

3. The outbreak this year has been especially prevalent at Kitson Town, Byles Top Mountain and Labour Hall, in the Spanish Town Medical District and there have been a number of cases at St. Johns, Old Road, Dover and Content in the Old Harbour Medical district.

4. Three years ago, in January, February and March, 1914, there were a large number of cases of this same complaint in the Guanaboa Vale district.

5. The complaint may be divided into 3 types of varying severity:—

(a) The first amounts practically to only chapped lips and the people treat it with a little unscented vaseline or healing oil when so treated it is cured in a few days (within a week.)

(b) The second type arises when A is untreated—the lips feel and become sore and ulcerated, there are slight excoriations at the angle of the mouth, and the tongue becomes sore and "strips" and ulcers may form in the sides of the tip of the tongue.

The people treat this condition with home remedies, alum wash or divi divi, and it gets well in from 2 to 4 weeks according to the vigour with which the treatment is pursued—many of the cases recover from both classes A and B without remedies of any sort.

(c) In the third type of case the affection extends throughout the mouth and throat and the patient's condition becomes very distressing. The lower lip is swollen and inverted, red and ulcerated, saliva runs from the mouth and there is difficulty and pain in swallowing constitutional symptoms. Even in this condition treatment is easily sought and the patients are able to walk about and follow their daily avocations—duration, when untreated, about 8 weeks.

6. All the above three types may be seen in the same house and the affection seems to be more severe in adults than in children. Thus I have seen children recover from type B walking about, and adults suffering from type C confined to their beds, in the same house.

7. In a small minority of cases of Type C inflammation of one or both eyes occurs (acute conjunctivitis) and may be attributed to the conveyance of saliva to the eye by the hands.

8. All the cases of type C are very uncommon in this district and there is always the possibility to be considered of types A and B being infected from the earth by the hands, as the people are all agricultural labourers, and not cleanly in their habits.

9. The affection is not dangerous and I have never heard of any death occurring from it.

10. A supply of medicines has been handed to the district constable to issue to those that are to apply for it.

I have, etc.,

F. O. SIMPSON, D.M.O.

Hon. S.M.O., Kingston.

Pathological Laboratory, Public Hospital,
19th April, 1917.

Hon. Suptg. Medical Officer,

Sir,

I am afraid I cannot make any remarks of value on this condition. Judging from Dr. Simpson's report the mild cases seem to resemble an ordinary catarrhal stomatitis which if neglected may take on a more severe ulcerative form. It is quite possible as he suggests that the conjunctiva becomes involved secondarily by conveyance of the infecting material from the mouth to the eyes.

Other suggestions however may be mentioned:

1. As Mr. Mossman states the fact that the hands and feet in some cases become cracked and sore, would naturally make one think of the "Foot and Mouth disease." This, as every one knows, is most frequent in ruminants, but there is sufficient evidence accumulated now to prove that it may be communi-

cated to man. The symptoms are at first hyperaemia and thickening of the corium, followed by vesiculation in the Malpighian layer and exfoliation to produce ulcers, usually accompanied by some degree of fever.

There may also in man be a similar vesiculation near the nails of the fingers and toes, and not infrequently gastro-intestinal derangement.

If this were the condition here, however, one would expect to hear of the presence of the disease at the same time and more widespread amongst cattle, cows, pigs, sheep, for when once this affection gains a hold amongst cattle it spreads with very great rapidity. The cause has not yet been discovered, though Prowazek and others regard it as one of the affections of Chlamydozoal nature, like Trachoma, Variola, Varicella, Alastrim, etc.

2. Ordinary ulcerative stomatitis. This may take on an epidemic form particularly under circumstances of bad hygiene, improper or insufficient food, bad ventilation and so forth. It has consequently been reported as widespread in institutions such as schools, camps, gaols.

The causative organism has not been isolated in these cases, but as stated above, it spreads like an infective disease and is fostered by oral uncleanness.

3. Sore mouth occurs in Jamaica, I believe, in those who eat much cane; possibly the acidity is a part cause. The sores arising from this or any other cause may furnish sites for the entrance of organisms which may then produce extension of the condition to the eyes, etc.

4. Lastly the sore mouth and eyes form a remarkable and constant feature of the cases on which I sent in a preliminary note a week or two ago in the Six monthly Laboratory Report, which is also included in the Annual Report for the year 1916-17.

This however differs from that described in Mr. Mossman's letter in that the eyes were almost invariably affected before the mouth and in a large percentage the inflammatory condition of the mucous membranes was followed by early involvement of the central nervous system.

I have, etc.

H. H. SCOTT, Govt. Bacteriologist.

40. Return as shewn by reports received.

District.	So-called Vomiting Sickness.				Pellagra.				Leprosy.			
	Males.	Females.	Male Deaths.	Female Deaths.	Males.	Females.	Male Deaths.	Female Deaths.	Males.	Females.	Male Deaths.	Female Deaths.
Kingston	..	..	..	..	5	16	1	3	1	1	..	..
Stony Hill	1	..	1	..	3	2	1	1	..	..	..	..
Lower St. Andrew	1	5	..	4	9	25	..	16	1	..	..	..
Gordon Town	..	..	..	..	..	1	..	1	..	..	..	..
Morant Bay	..	..	..	..	1	..	..	..	..	..	..	..
Plan. Garden River	..	..	..	..	..	..	..	..	..	4	..	..
Port Antonio	..	..	..	2	..	..	..	1	..	..	..	..
Buff Bay	4	4	1	1	..	2	..	..	..	..	..	..
Richmond	2	1	3	5	..	..	..	..	..	..	..	..
Port Maria	2	2	2	2	..	..	..	..	..	2	..	..
Gayle	7	9	4	1	..	1	..	..	..	..	..	..
Claremont	10	23	2	10	..	1	..	..	..	..	..	..
Cave Valley	1	2	..	2	..	..	..	..	..	1	..	..
Ulster Spring	4	3	..	2	..	..	..	..	..	..	..	..
Falmouth	2	4	3	..	..	..	..	..	..	..	..	..
Duncans	14	9	4	3	..	..	..	..	1	..	..	..
Montego Bay	1	3	..	..	..	..	..	..	1	..	..	..
Adelphi	2	1	..	..	..	..	..	..	..	..	..	..
Grange Hill	2	1	2	1	..	..	..	..	..	..	..	..
Sav.-la-Mar	..	..	..	..	..	1	..	..	..	1	..	..
Santa Cruz	..	..	..	..	1	1	..	..	1	..	..	..
Balaclava	3	2	1	1	..	..	..	..	..	..	..	..
Newport	3	2	3	..	..	..	..	..	..	..	..	..
Chapelton	..	..	..	..	..	..	..	..	..	1	..	..
May Pen	..	..	..	..	3	2	..	1	..	..	..	..
Vere	..	..	..	..	1	1	1	1	..	..	..	..
Spanish Town	..	..	..	..	..	..	..	..	2	1	..	..
Old Harbour	..	3	..	3	..	..	..	..	..	1	..	..
Southfield	..	..	..	..	2	1	..	..	..	1	..	..
	59	74	26	37	25	54	3	24	7	13	..	1

SYNOPSIS OF D.M.O's. REPORTS.

41. *Water Supplies.*—*Annotto Bay*—The water supply of the town of Annotto Bay is derived from a source five miles out of the town at a great elevation and fenced away from possible contamination by man or beast. It juts out of a rock by five streams three of which are utilised and enters a general intake without being filtered and is supplied to the town by pipes. The pressure is very high and many safety vents or outlets are provided to prevent the bursting of the mains. Were it not that the water at times required to be filtered, such as in many seasons, there could be no complaint as to quality. A filter bed is necessary. No public tanks in the district. One horse trough exists outside the market rails and an unused fountain is within the market enclosure which, if put in operation, could serve a useful purpose especially on market days.

Adelphi—The water supply of the Eastern part of the district is for the most part bad. It is derived chiefly from wells and cattle ponds. These ponds are unprotected.

The other parts of the district derive their water supply from unprotected springs and streams. The only tanks (with the exception of a few small private ones) are at the police station and market at Adelphi. The latter is open to the Public for one hour each day—7 a.m. to 8 a.m., after that hour the people turn to the ponds for their water.

Buff Bay—The chief source of supply to Buff Bay is to be found in wells—a fact very much to be deplored for the reason that for the most part they are shallow wells in close proximity to pit closets and subject therefore to sewage contamination and, secondly, they form excellent breeding places for the *Anopheles* mosquitoes—the town stands in very urgent need of a proper water supply system from some known pure source.

The villages get their water supply from the many rivers and springs with which the district abounds. The quantity available has been ample for all purposes but in times of drought the Buff Bay wells above described must get dry and consequent shortage of water supply must obtain.

It is safe to say that the water supply of all the towns and villages in this district are subject to pollution and it is a matter for regret that springs used as a source of water supply should not be protected, and that the water supply for Buff Bay has not before now been replaced by a proper water supply system from some such protected spring. There are no public tanks.

Black River—The water supply is good. It is taken from the Y.S. tributary and piped to Black River. The supply is ample and it is not liable to pollution as it is protected.

Claremont—Water supply is from tanks and the quantity is ample. All Public tanks are protected. Elsewhere the supply is from ponds and the Moneague Lakes.

Cave Valley—The water supply is from public and private tanks and protected springs and rivers. The quantity is abundant and the purity good. Remotely liable to pollution. All the public water supplies the D.M.O. thinks are protected.

There are two public tanks in Brown's Town also one at Vauxhall, Watt Town, Bethany, Alva and at Oughton.

Chapelton—The water supply remains the same as usual. The water is brought some distance by pipes from a spring.

Crofts Hill—The water supply is chiefly from rivers and springs and in a few cases from rain water stored in tanks. The quantity available is ample, but the purity is very questionable especially in cases of rivers and in those springs where the water is obtained some distance from the source. One spring is protected and this protection is being brought to the notice of the people in the neighbourhood by means of notice boards calling their attention to this fact and warning them against polluting this stream. There are no public tanks in the district.

Duncans—The water supply is from ponds as a rule—one or two from springs and rivers. In droughts there is a great scarcity. It is liable to pollution as the supply is from ponds and they are not protected. There are no public tanks.

Falmouth—There is an unlimited supply of water in the town of Falmouth which is from the Martha Brae River. It is good and pure also protected. One public tank in Falmouth connected directly with the pipe system. The water has to be pumped up to the Upper story of the Public Hospital.

Gordon Town—The water supply of Gordon Town is obtained from the Hope River which is protected. Mavis Bank is supplied by rivers and springs which are protected. The district is abundantly supplied with water from various springs and rivers, many of these are open to pollution. There are no public tanks.

Grange Hill—The water supply is by wells only, they are not covered and the supply is often very low, many becoming dry. It is liable to pollution as it is not protected. There are no public tanks.

Gayle—The water supply for the most part is from springs. Some parts depend on rivers, some tanks, others ponds. The district is well supplied with water. Very few of the springs run dry and that only in very dry weather.

Hagley Gap—Water supply is obtained from springs, rivers and streams. The quantity is abundant.

Hordley—The water supply of the villages of this district is good and there is an ample supply for all purposes, but are all liable to pollution. There are no public tanks.

Lower St. Andrew—Water supply is derived from the Hope River and Constant Spring Water supply. No scarcity occurred during the year. Its purity is fairly reliable though there is some liability to pollution. Effort is made to protect the streams and reservoirs.

Little London.—Water supply remains the same.

Linstead—The water supply is still unsatisfactory. It is by pipes from a source 8 miles away, is liable to pollution and quite undrinkable at times. At other times, owing to the Intake being choked, with sand and mud, the supply is entirely cut off for days. This primitive and annoying state of things has been going on for years, but the Parochial Board for ever turns an unwilling ear to the pleadings, groanings and murmurings of the unfortunate ratepayers for reform. No public tanks. The water supply of the villages consists of streams and rivers except at Ewarton where the standpipe supplies the village.

Lambs River—The water supply of the chief towns and villages is by means of ponds and tanks. The poorer classes take their water from the ponds while the better classes have tanks. The quantity is practically always plentiful. The ponds are unprotected and are always liable to pollution at any time. There are no public tanks in the district but there is a spring in the York district under the control of the Parochial Board.

Lionel Town.—The water supply in most of the districts has been good but in many cases the wells need covering.

Morant Bay—The population of the parish, with the exception of Morant Bay, is dependent for its water on the numerous streams which are more or less liable to temporary pollution. The Morant Bay Water Works, with reservoir and pipe system, have hitherto furnished a fairly adequate supply of good water. Of late it has been unequal to the demands made on it by all sections of the inhabitants. The hill residents have always complained of its inadequacy.

Montego Bay—The water supply of Montego Bay is the same. From a sanitary point of view it is not perfect, but the water is fairly pure. The supply has been good as to service and quantity.

The water supply of all villages and districts is effected by springs and ponds and in all cases is not fit to drink unless boiled. As far as is known all these sources of supply are under the protection of the Parochial Board.

May Pen—The chief source of the water supply is from the Rio Minho. The quantity of water available is not always sufficient, and at times there is a cessation of water in the taps for days, which naturally causes much inconvenience. In the rainy months the water is muddy. The purity of the water supply is very doubtful. At the intake there is no protection from pollution. There is always great difficulty in procuring water at Four Paths, moreso during the dry months. The water is supplied from a well at Sheekles Pen drawn by buckets—no protection or precaution is taken to avoid pollution. In the outlying districts the water supply is bad as the only means of obtaining it is from ponds to which animals have access and in which is always to be found decayed vegetable matter.

There are no public tanks but there are four stand pipes situated at the outskirts of May Pen.

Newport—Most villages in this district derive their water supply from "tanks." The public tanks are good but the private ones are generally much inferior; many are only holes dug in the earth with no curbing and often situated in low places enabling surface water to run in during the rains.

Old Harbour—The water supply of the town of Old Harbour, the village of Old Harbour and the district of Church Pen, is derived from a Dam at Bartons and a reservoir at Colbeck. The water is protected from pollution by being conveyed in iron pipes from its source to its destination. The village of Pot House obtains water principally from the irrigation pipe line which runs from Spring Garden to supply Bushy Park and Thetford. This water is thus also protected from pollution by being conveyed in iron pipes.

The district of Bartons is supplied from a covered cistern from which water is drawn by taps. This cistern is filled by a spring which flows directly into it and is practically inexhaustable. There is one public tank in the district situated at Red Ground.

Port Maria—The source of the water supply of Port Maria is Sandhill Crescent, 8 miles away. The supply is constant, yielding 200,000 gals. daily. Pure as there is no possibility of pollution.

There are no public tanks in the district, but there are protected wells at Galina, Salt Gut and protected springs at Oracabessa and other places.

Port Royal—The town is supplied with water from the Admiralty Spring at Rock Fort by means of pipes laid along the Palisadoes, and is under the control of the Military Authorities. There is no visible source of pollution. The supply is cut off during certain hours of the day and at nights. There are no public tanks.

Richmond—The two principal towns in the district, Richmond and Highgate, depend for their water supplies on springs, tanks and wells. The former are easily polluted and are only partially protected. During the rainy seasons the quantity is ample, but in dry weather water has to be carried for quite long distances.

Stony Hill—The water supply of Stony Hill village is from a surface spring, and the Industrial School gets its supply from tanks and surface wells. All these are very liable to contamination. There is a public tank at Red Hills. The rest of the district is supplied by rivers and springs the majority of which are protected under the Law.

St. Ann's Bay—The source of the water supply of St. Ann's Bay is from the Roaring River. Villages for the most part from local rivers. Quantity unlimited. Not more than ordinarily liable to pollution.

Sav.-la-Mar.—The water supply of Sav.-la-Mar came under suspicion during the outbreak of Typhoid Fever, but it is not known that anything definite was proved against its purity.

Ulster Spring—The water supply is abundant and of good quality but mostly obtained from the deepseated springs which abound in that part of the parish.

42. Return of infective diseases reported by Local Boards of Health to the Central Board of Health under the Notification of Infective Diseases Law 31 of 1912, for the financial year, 1916-1917.

Parish.	Typhoid Fever.	Para-Typhoid Fever.	Pulmonary Tuberculosis.	Scarlet Fever.	Cerebro-Spinal Meningitis.	Pneumonia.	Puerperal Fever.	Leprosy.	Diphtheria.	Septicaemia.	Beri Beri.	Whooping Cough†	Yaws.*	Measles†	Ophthalmia Neonatorum.	Chicken Pox†	Poliomylitis.	Dysentery†	Totals.
Kingston	329	6	266	..	3	307	4	1	5	1	1	46	13	91	14	50	3	..	1,140
St. Andrew	19	..	13	..	..	22	..	..	1	..	..	1	..	30	..	1	..	..	87
St. Thomas	21	3	30	..	7	33	1	1	..	..	..	..	..	..	..	..	1	..	97
Portland	64	3	120	..	..	29	3	1	..	..	1	..	..	..	1	..	2	..	224
St. Mary	53	..	26	..	..	20	2	..	1	..	..	..	..	..	..	..	..	..	102
St. Ann	43	..	35	1	..	5	1	..	..	..	..	..	..	..	..	..	1	33	119
Trelawny	9	..	12	..	..	3	..	..	..	..	..	..	..	..	..	..	..	..	24
St. James	8	..	24	..	..	7	..	..	..	..	..	..	..	..	..	..	..	..	39
Hanover	1	..	..	..	..	6	..	..	..	..	..	..	..	..	..	..	..	..	7
Westmoreland	39	..	16	..	..	7	..	..	..	..	..	..	..	..	1	..	..	..	63
St. Elizabeth	8	..	21	..	1	13	1	..	..	2	..	..	..	..	..	..	..	..	46
Manchester	41	..	21	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	62
Clarendon	18	..	14	..	..	8	..	1	1	..	..	..	..	..	..	..	..	..	42
St. Catherine	69	1	61	1	..	73	3	..	..	1	..	..	..	..	..	..	1	..	210
	722	13	659	2	11	533	15	4	8	4	2	47	13	121	16	51	8	33	2,262

* In Kingston only.

† In Kingston and St. Andrew only.

‡ In St. Ann only.

43. Return showing the number of admissions to the Country Hospitals during the last 12 years.

Hospital.	1905- 1906.	1906- 1907.	1907- 1908.	1908- 1909.	1909- 1910.	1910- 1911.	1911- 1912.	1912- 1913.	1913- 1914.	1914- 1915.	1915- 1916.	1916- 1917.
Morant Bay ..	469	510	534	660	531	545	782	730	713	688	535	500
Hordley ..	587	707	555	629	621	537	918	1,294	1,777	1,431	1,305	1,094
Port Antonio ..	1,673	1,788	3,359	3,674	3,200	4,288	5,680	6,110	5,170	5,423	3,242	2,748
Buff Bay ..	734	654	937	935	755	1,216	1,341	1,961	3,516	3,494	2,187	2,235
Annotto Bay ..	3,739	4,313	4,641	5,338	5,005	6,138	5,558	5,169	4,440	3,934	3,282	2,238
Port Maria ..	1,610	1,388	1,380	1,584	1,837	2,502	2,627	2,532	1,984	1,931	1,320	1,192
St. Ann's Bay ..	194	252	285	264	219	235	274	414	429	394	406	406
Cave Valley ..	76	87	83	93	91	81	98	101	95	87	84	58
Falmouth ..	238	262	209	252	330	308	376	315	192	185	232	275
Ulster Spring ..	..	..	..	..	..	..	..	..	..	44	66	68
Montego Bay ..	302	266	228	228	180	337	494	796	871	698	830	700
Lucea ..	276	224	244	241	237	296	295	284	581	435	400	325
Sav.-la-Mar ..	226	1,026	861	857	800	1,961	1,440	1,989	3,996	2,732	3,356	4,526
Black River ..	274	301	385	321	305	285	316	343	342	344	517	520
Mandeville ..	312	323	259	245	283	281	401	415	377	428	385	337
Chapelton ..	331	480	489	335	344	364	424	530	384	452	366	363
Lionel Town ..	1,533	3,532	2,062	1,852	2,070	1,700	2,547	2,497	2,636	1,802	1,792	2,588
Spanish Town ..	1,160	1,360	1,262	1,260	1,379	1,444	1,544	1,857	1,601	1,577	1,396	1,619
Linstead ..	..	..	..	..	..	121	195	494	458	395	293	311
	13,734	17,473	17,773	18,768	18,187	22,339	25,210	27,831	29,562	26,474	21,994	22,103

44. Statement of amounts received for Hospital Fees from paying patients (other than Constables) at the Public General Hospitals during the year 1916-17.

Hospital.	Amount.
Morant Bay	£5 11 10
Hordley	13 5 0
Port Antonio	23 4 8
Buff Bay	15 4 8
Annotto Bay	16 5 10
Port Maria	30 7 2
St. Ann's Bay	3 3 0
Cave Valley	12 0 0
Falmouth	2 11 0
Ulster Spring	2 7 6
Montego Bay	3 5 6
Lucea	4 11 0
Sav.-la-Mar	54 5 6
Black River	35 6 1
Mandeville	6 15 0
Chapelton	1 16 6
Lionel Town	2 9 6
Spanish Town	8 3 6
Linstead	8 13 2
	<hr/> 249 6 5 <hr/>

45. Return showing the various classes of patients admitted to Public General Hospitals with Nos. of each, also amounts received from Paying Patients.

Hospital.	Constables.	Paupers on pauper roll.	Casual paupers.	Poor persons admitted without charge.	Poor persons attended as outpatients in connection with hospital outpatients system.	Indentured Coolie Labourers.	Prisoners.	Paying patients.	Maintenance Dues.	
									Received. £ s. d.	Dues. £ s. d.
Morant Bay	135	2	798	264	1,180	145	276	14	5 4 6	
Hordley	56	3	..	454	1,137	622	2	14	13 5 0	
Port Antonio	17	9	..	1,340	1,376	1,370	6	..	18 17 0	2 4 0
Buff Bay	4	..	1,525	..	1,067	654	2	50	14 4 0	1 3 0
Annotto Bay	7	..	11	389	21	1,942	6	9	13 0 6	
Port Maria	19	1	..	649	695	503	4	16	27 18 6	1 2 0
St. Ann's Bay	9	..	..	380	541	3	..	14	3 3 6	3 15 6
Cave Valley	..	2	1	42	68	..	..	13	12 0 0	..
Falmouth	18	1	..	243	389	17	1	5	2 11 0	1 7 6
Ulster Spring	3	..	8	61	91	..	..	1	..	35
Montego Bay	60	12	..	321	2,740	302	2	3	1 12 6	
Lucea	34	..	..	256	2,033	22	3	10	4 11 0	
Sav.-la-Mar	29	8	300	399	227	3,965	6	46	54 5 6	14 11 6
Black River	29	..	3	372	1,921	74	..	45	37 19 1	7 2 8
Mandeville	12	..	320	..	380	..	..	5	9 10 6	6 10 6
Chapelton	20	1	..	361	516	..	5	2	1 16 6	
Lionel Town	11	40	359	399	448	1,191	2	4	2 9 6	
Spanish Town	80	3	..	925	2,625	604	2	5	3 6 6	
Linstead	2	1	..	252	633	45	..	11	8 10 6	
	545	83	3,325	7,047	18,088	11,459	317	267	234 5 7	37 16 8

46. TABLE No. I.

Hospital.	Mortality Rate.			Largest Daily No.			Smallest Daily No.			Daily average.			Date of largest daily number of Patients.	Date of smallest daily number of Patients.
	Coolies.	Creoles.	Total.	Coolies.	Creoles.	Total.	Coolies.	Creoles.	Total.	Coolies.	Creoles.	Total.		
Morant Bay	.99	6.38	4.2	3	23	26	4	7	11	5	15	20	12.7.16	26.12.16
Hordley	1.45	4.33	2.76	24	40	64	11	25	36	16	35	51	8.11.16	14.5.16
Port Antonio	.43	2.34	1.43	60	68	128	19	53	72	37	67	104	15.11.16	2.4.16
Buff Bay	1.79	3.46	2.97	55	134	189	14	70	84	29	114	143	5.12.16	2.4.16
Annotto Bay	1.08	7.3	2.19	134	39	173	58	17	75	81	24	105	1.11.16	30.5.16
Port Maria	1.62	5.3	3.5	48	46	94	14	39	53	26	47	73	20.11.16	24.12.16
St. Ann's Bay	..	5.29	5.25	1	26	27	1	10	11	2	17	19	6.1.17	24.12.16
Cave Valley	..	..	..	..	10	10	..	3	3	..	6	6	22.9.16	5.5.16
Falmouth	..	5.04	5.04	5	22	27	..	6	6	1	13	14	14.4.16	October
Ulster Spring	..	2.86	2.86	..	8	8	..	1	1	..	5	5	28.10.16	12.6.16
Montego Bay	..	6	3.4	11	40	51	5	25	30	8	33	41	6.10.16	30.5.16
Lucea	12	3.16	3.81	2	23	25	..	9	9	1	17	18	..	24.12.16
Sav.-la-Mar	.28	2.66	.496	196	27	223	27	26	53	111	28	139	23.11.16	18.4.16
Black River	..	5.15	5.07	9	25	34	1	17	18	2	25	27	28.11.16	December
Mandeville	..	9.1	9.1	..	33	33	..	18	18	..	26	26	1.5.16	1.10.16
Chapelton	..	8.2	8.2	..	39	39	..	22	22	..	31	31	18.1.17	29.11.16
Lionel Town	1.41	7.02	2.35	131	24	155	16	10	26	57	29	86	20.10.16	3.4.16
Spanish Town	1.44	8.18	5.73	51	76	127	11	63	74	28	67	95	24.11.16	8.5.16
Linstead	..	8.17	6.44	2	31	33	2	13	15	3	22	25	8.6.16	9.3.17

TABLE No. II.

Hospitals.	Remaining in Hospital 1.4.16.			Admissions.			Discharged.			Died.			Remaining in Hospital 31.3.17.		
	Coolies.	Creoles.	Total.	Coolies.	Creoles.	Total.	Coolies.	Creoles.	Total.	Coolies.	Creoles.	Total.	Coolies.	Creoles.	Total.
Morant Bay	2	19	21	202	298	500	197	285	482	2	19	21	5	13	18
Hordley	26	31	57	594	500	1,094	573	436	1,009	9	23	32	12	41	53
Port Antonio	18	56	74	1,356	1,392	2,748	1,339	1,341	2,680	6	34	40	29	73	102
Buff Bay	16	68	84	654	1,581	2,235	641	1,497	2,138	12	57	69	17	95	112
Annotto Bay	86	40	126	1,856	382	2,238	1,858	358	2,216	21	31	52	63	33	96
Port Maria	22	43	65	594	598	1,192	590	560	1,150	10	34	44	16	47	63
St. Ann's Bay	..	13	13	3	403	406	3	361	364	..	22	22	..	20	20
Cave Valley	..	7	7	..	58	58	..	58	58	..	..	..	..	9	9
Falmouth	..	10	10	17	258	275	16	243	259	..	13	13	1	12	13
Ulster Spring	..	5	5	..	68	68	..	69	69	..	2	2	..	4	4
Montego Bay	4	28	32	302	398	700	301	367	668	..	24	24	5	35	40
Lucca	..	16	16	25	300	325	21	290	311	3	10	13	1	16	17
Sav.-la-Mar	77	33	110	4,145	381	4,526	4,099	378	4,477	12	11	23	111	25	136
Black River	..	17	17	74	446	520	74	413	487	..	27	27	..	23	23
Mandeville	..	20	20	..	337	337	..	283	283	..	31	31	..	23	23
Chapelton	..	26	26	..	363	363	..	334	334	..	32	32	..	23	23
Lionel Town	27	13	40	2,160	428	2,588	2,089	391	2,480	31	31	62	60	26	86
Spanish Town	17	73	90	604	1,015	1,619	575	936	1,511	9	89	98	37	63	100
Linstead	3	24	27	66	245	311	64	229	293	..	22	22	5	18	23
	298	542	840	12,652	9,451	22,103	12,440	8,829	21,269	115	512	627	362	599	961

48. *Quarantine*—
Chairman and Members Quarantine Board.

Gentlemen,

Another year has come to a close and I am pleased to be able to state that not a single case of infective disease has been introduced into the Island from countries with which we have had communication.

2. The war still continues and its effects have been felt very much in quarantine as in everything else. The year has been a most anxious and trying one as vessels are now arriving frequently from infected ports with which we rarely had communication until recently.

3. There was an outbreak of small-pox in Porto Rico early in the year. A few cases have also occurred in the Northern Atlantic cities of the United States; and in the town of New Orleans the disease has been present for the greater part of the year, and at one period it looked as if it would become epidemic.

The usual regulations against the introduction into this Island of the disease were promptly put into force as necessity arose and rigidly carried out with the happy result that not a single case has occurred in the Island. At the commencement of the period under review passengers from the Pacific coast of America and Mexico were under standing regulation for smallpox, and since then Guatemala has been added and all remain subject to the regulation at the present date.

4. No cases of Cholera have occurred in vessels coming to Jamaica.

5. Yellow Fever has been prevalent in Mexico during the year and the regulations against that disease were put in force against that country. The regulations still remain in force as it is a little difficult at present to ascertain the real sanitary condition of that country. A case of Yellow Fever also occurred at Martinique, no others were reported.

6. In September, 1916, the Government of Barbados reported the presence of Yellow Fever in that Island.

The Yellow Fever regulations modified to suit the conditions were at once applied.

7. Dr. Guiteras of Havana, an authority on Yellow Fever, happened to visit Barbados and the Government of that Colony availed itself of his services in the matter and he, after examination of the cases and consultation with the Medical Authorities, pronounced that the disease was not Yellow Fever, and that there had not been any cases of such disease. This opinion being concurred in by the said Medical Authorities our regulations were, on receipt of the information, at once withdrawn.

8. At the commencement of the year Santiago de Cuba was under restrictions for Plague. There having been no further cases the restrictions were withdrawn in May, 1916.

The health conditions in Cuba have remained good, no cases of plague in man or rat having been reported during the year. As it is very easy, however, to overlook plague in rats (the chief carrier of the disease) and as the disease may still exist among them all vessels arriving from Cuba have been thoroughly ratguarded and fended off while alongside here.

I will refer later on to the uses of the ratguard and fending.

9. Plague has been present in several parts of the South African Union. It first appeared in Cape Province, then in the Transvaal and more recently in the Orange River Colony. The outbreak has not been serious. The cases were all far inland. None have appeared in any of the seaports so that there was practically no danger of its being transmitted to vessels and thereby to other countries.

10. In August two cases of Plague occurred in Bristol. The Port of Avonmouth from which the Elders and Fyffes vessels sail for Jamaica is only a few miles distant from Bristol. These vessels were placed under supervision while in Jamaican waters. Prompt measures for the eradication of the disease in Bristol were taken by Dr. Davies the Health Officer, which prevented any spread of the disease, and as no further cases occurred, the restrictions were in due course withdrawn.

11. Liverpool also had a few cases of Plague in September. Prompt measures for combating the disease were taken by the Local Authorities, and although they were not so successful as Bristol in eradicating the disease inasmuch as one plague infected rat was found recently, there have been no further cases in man. Vessels and their cargo are still subject to supervision here, but it is hoped that conditions in Liverpool will so improve as to allow of cargo being discharged without examination.

12. There is not much danger of Plague infection from a country known to be plague infected, as the necessary measures to prevent infection are taken.

13. The danger lies in being infected by a country before that country knows it is infected itself or can make up its mind to notify its neighbours of the infection.

14. Rats are great wanderers, and as soon as night comes they try to get ashore from the ship, particularly sick ones, as they hope apparently that the change will improve their health.

15. A vessel may pick up a plague infected rat at a plague infected port and pass through several clean ports before the rat gets ashore. In the meantime it may have infected others on the ship and still the disease may not appear among the crew.

16. It is here that the use of ratguards, that fending off, and the raising of gangways at night come in and keep a country clean. A rat cannot go ashore along a mooring line provided that it is protected by a properly set ratguard. The ratguards in use in this Island have recently been improved and are now very effective.

The crew of a vessel arriving here for the first time rarely know how to set a ratguard properly. Ships Officers appear to think that as long as a ratguard is on the line it does not matter how it is placed. However, after being instructed on their first visit to this Island they generally give less trouble on subsequent calls.

17. Vessels whose gunwale is only a little above the wharf are required to breast off 8 feet between sunset and sunrise unless actually working and under supervision as it would be of no use ratguarding such vessels if they are allowed to be alongside at night, as rats could easily jump on to the wharf. The reason for raising of gangways is obvious.

18. I might here mention that the SS. Conway while discharging cargo under supervision last October was found on examination of a broken package to have a rat secreted therein which had it not been discovered would have eluded the ratguards and all other means for keeping it aboard.

19. Most of the countries under quarantine restrictions at the commencement of the year are in the same position.

20. Health conditions have not improved in the infected parts of South America or either the Atlantic or Pacific seaboard.

21. There was a serious outbreak during the year of Poliomyelitis (infantile paralysis) in the State of New York.

The disease gradually spread along the Atlantic Coast until nearly all the large cities were affected though none of them to the same extent as New York.

Prompt measures were taken to keep the disease out of Jamaica, and it is pleasing to be able to record that not a single case was introduced into the Island.

22. The disease has been declared by the Governor in Privy Council to be a quarantinable one under the Quarantine Laws.

23. The two disinfecting machines are in thorough working order and have been in frequent use during the year, though not to the same extent as in former years, as on account of the necessity for the quick despatch of vessels fumigation has had to be replaced in many cases by supervision.

24. Cyanide gas as a fumigant has been in use for some time at New Orleans and latterly at New York.

It appears to be quite efficient for disinfection purposes and has a twofold advantage over most other fumigants, firstly, in that it does not destroy any class of cargo and secondly in the rapidity of its action. It requires about 2 hours only to fumigate any portion of a ship on which it is used. After the war it may be possible to adopt it here.

25. The Quarantine Station is in good condition. No passengers have been detained there during the year under review.

The Institution was lent, however, for a short time for the use of the coolies arriving from India, and also for a long period to the Jamaica War Contingent.

26. A few sheep are now kept at the Quarantine Station to assist to keep the grounds clean.

27. 1,478 packages of baggage were disinfected at the Quarantine Station during the year.

28. The weekly reports of the United States Public Health Service have been received regularly during the year and have been most useful and helpful inasmuch as they keep us informed as to the health conditions all over the world.

29. During part of the year Dr. Scott was absent on Military duties and the vacancy created by his absence was filled by Dr. Williams, Medical Superintendent at the Lunatic Asylum.

Dr. Williams took a keen interest in all matters relating to quarantine and was always ready to assist and advise me whenever I required it.

30. Several prosecutions were instituted during the year and in each case fines were inflicted.

CHARLES DON,
Secretary Quarantine Board.

49. Summary of Diseases, in the Public General Hospitals, financial year, 1916-1917.

Name of Disease.	Cases.	Deaths.	Name of Disease.	Cases.	Deaths.
Measles ..	25	1	Ulcers ..	1,071	
Chicken Pox ..	3		Leprosy—		
Influenza ..	32	1	(a) Tubercular ..	1	
Diphtheria ..	1		(b) Anaesthetic ..	4	
Mumps ..	1		Yaws ..	932	1
Enteric Fever—			Syphilis—		
(a) Typhoid ..	224	63	(a) Primary ..	131	
(b) Paratyphoid ..	8		(b) Secondary ..	327	2
Puerperal Fever ..	2	1	(c) Tertiary ..	86	5
Dysentery—			(d) Inherited ..	97	1
(a) Bacillary ..	19	6	Gonorrhoea ..	540	3
(b) Amoebic ..	95	7	Alcoholism ..	5	
Malarial Fever—			Rheumatism ..	719	3
(a) Intermittent ..	5,714	46	Rheumatic Fever ..	3	3
(b) Remittent ..	114	12	Gondo ..	1	
(c) Pernicious R. ..	12	12	New Growth—		
Black Water Fever ..	8	1	(a) Non-Malignant ..	49	3
Erysipelas ..	1		(b) Malignant ..	64	8
Pyaemia ..	1	1	Anaemia ..	86	7
Septicaemia ..	22	9	Diabetes, Mellitus ..	1	
Tetanus ..	8	4	Debility ..	180	14
Ptomaine Poisoning ..	1		Beri Beri ..	1	
Tubercle—			Pellagra ..	3	
(a) Pulmonary Tuberculosis	156	44	Jaundice ..	4	2
(b) Diseases of Bones	9		Vomiting Sickness (so-called)	2	1
(c) Gland Affections	34	1	Dhobie Itch ..	1	
(d) Diseases of Joints	17	2	Other Diseases ..	299	1
			Immaturity at Birth ..	1	

Name of Disease.	Cases.	Deaths.	Name of Disease.	Cases.	Deaths.
Diseases of the Nerves—			Male Organs ..	388	4
Neuritis ..	132	2	Female Organs ..	414	13
Meningitis—			Organs of Locomotion ..	180	5
(a) Cerebro Spinal ..	14	6	Cellular Tissue ..	582	8
(b) Other Varieties ..	3	1	Skin ..	3,089	5
Myelitis ..	2		Pregnancy ..	26	
Abscess of Brain ..		1	Premature Birth ..	2	1
Congestion of Brain ..	3		Confinement ..	3	1
Functional Nervous disorders—			Senility ..	6	2
Apoplexy ..	7	2	Gangrene ..	3	
Paralysis ..	24	1	Parturition ..	7	1
Chorea ..	1		Connective Tissue ..	1	
Eclampsia ..	5	1	Injuries—		
Parplegra ..	3		(a) General ..	87	10
Epilepsy ..	31	2	(b) Local ..	1,754	37
Neuralgia ..	58		Malformations ..	7	
Hysteria ..	22		Poisons ..	12	2
Mental Diseases—			Hookworm Disease ..	220	4
Mania ..	1		Parasites, Infected by—		
Melancholia ..	6		(1) Anchylostoma Duodenale ..	1192	4
Dementia ..	12	1	(2) Ascaris Lumbricoides ..	266	9
Delusional Insanity ..	4		(3) Oxyuris Vermicularis ..	2	
Lumbago ..	61		(4) Trichina Spiralis ..	33	
Siriasis ..	1		(5) Filarial Diseases ..	1	
Locomotor Ataxia ..	1	1	(6) Ringworm ..	17	
Disease of—			(7) Itch ..	191	
Eye ..	362		(8) Any other Variety ..	24	
Ear ..	75		Chigoes ..	31	
Nose ..	10		No Disease ..	1,118	1
Circulatory System ..	140	32			
Respiratory System ..	975	51			
Digestive System ..	1,752	87			
Lymphatic System ..	216			25,252	620
Urinary System ..	470	58			
Generative System ..	90	2			

50. Summary of Operations, financial year 1916-1917, (performed in the various Hospitals).

Operations.	Cases.	Deaths.	Operations.	Cases.	Deaths.
Abscesses, incisions of ..	351	2	(e) Perineal Abscess ..	7	
Abdominal Section—			(f) Puncturing Scrotum ..	1	
(a) Appendectomy ..	1		(g) Retention of Urine ..	21	2
(b) Laparotomy ..	20	8	(h) Washing out Bladder ..	6	
(c) Volvulus of Sigmoid ..	3	2	(i) Plastic Operation on Urethra ..	2	
(d) Hysterectomy ..	9	1	(j) Suprapubic Lithotomy ..	1	
(e) Oophorectomy ..	2		Bones—		
(f) Ectopic Gestation ..	2		(a) Necrosis ..	14	
(g) Washing out Stomach ..	15		(b) Osteotomy ..	8	
(h) Paracentesis Abdominis ..	13		(c) Periostotomy ..	9	
(i) Paracentesis Thoracis ..	3		(d) Sequestrotomy ..	27	
(j) Hydrosalphinx ..	1	1	Eye on—		
(k) Ovarian Cyst ..	1		(a) Pterygium ..	3	
(l) Tapping Abdomen ..	1		(b) Iridectomy ..	1	
Aneurism—			(c) Conjunctiva excision ..	1	
(a) Ligature of Artery ..	1		(d) Exterpation of Globe ..	26	
(b) Wound of Artery ..	1		(e) Supplying of Chemosed Lids ..	2	
(c) Excision of Artery ..	1		(f) Extraction of Cataract ..		
Amputations—			sine Iridectomy ..	3	
(a) Foot (Symes) ..	11		(g) Excision—Sarcoma of Eye ..	1	
(b) Leg (Thigh) ..	27	6	(h) Enucleation of Eye ..	1	
(c) Digits ..	95		(i) Needling Cataract ..	1	
(d) Penis ..	6		Foreign bodies removed from—		
(e) Forearm ..	12	1	(a) Ear ..	6	
(f) Breast ..	10		(b) Foot ..	15	1
(g) Labia ..	1		(c) Nose ..	2	
(h) Uvula ..	1		(d) Eye ..	4	
Bladder and Urethra—			(e) Finger ..	2	
(a) Stricture, dilation of ..	136	1	(f) Leg ..	1	
(b) External Urethrotomy ..	3		(g) Rectum ..	1	
(c) Internal Urethrotomy ..	5		(h) Throat ..	1	
(d) Perineal Section ..	15	3	(i) Abdominal Cavity ..	2	

Operations.	Cases.	Deaths.	Operations.	Cases.	Deaths.
Face, Nose, Mouth, &c.—			Trephining and cleaning Mas-		
(a) Nasal Polypus (rem.)	8		toid Cells ..	9	1
(b) Tonsils removed ..	37		Tendons—		
(c) Tracheotomy ..	1		(a) Suturing of Wounds	179	1
Joints—			(b) Tenotomy ..	2	
(a) Arthrotomy ..	7	1	Tumours and Cysts—		
(b) Ankylosis ..	5		(a) Adenoids ..	8	
(c) Excision ..	2		(b) Bursal Tumour ..	1	
(d) Aspirating Knee ..	4		(c) Carcinoma ..	13	1
(e) Incision into knee	3		(d) Lipoma ..	6	1
(f) Dislocations ..	2		(e) Fibroma ..	9	1
(g) Reduction of Joints	2		(f) Excision of Cyst ..	2	
Lymph Glands—			(g) Bakers Cyst ..	1	
(a) Excision of ..	68		(h) Mibomian Cyst	1	
(b) Insision of ..	18		(i) Sebaceous Cyst ..	3	
(c) Scraping and Cauterising	6		(j) Cystic Tumour of Jaw	2	
Hernia—			(k) Hæmatoma pectorales Major	1	
(a) Reduction of ..	1		(l) Ganglion ..	1	
(b) Radical cure for ..	26		(m) Papilloma ..	2	
(c) Herniotomy for Strangulated			(n) Celloids ..	6	
Hernia ..	6	1	Examination under Chloroform	21	
Fractures—			Scraping Chronic Ulcers	69	
Simple and Compound	195	2	Extraction of Teeth ..	513	
Male Generative Organs—			Slitting up Sinus ..	50	
(a) Paraphymosis ..	15		Synovitis Paracentesis ..	2	
(b) Tapping Hydrocele	41		Paracentesis of Abdomen	20	
(c) Radical cure Hydrocele	9		Paracentesis Thoracis ..	5	
(d) Circumcisions ..	179		Paracentesis Scrotum ..	1	
(e) Chancroids, cauterising	21		Paracentesis Pleura ..	1	
(f) Slitting up Prepuce	6		Delivery with Forceps	4	
(g) Venereal Warts Removed	4		Phlebotomy ..	12	
(h) Castration ..	2		Removal of Tubercular Glands	6	
Female Generative Organs—			Scraping Tubercular Glands	2	
(a) Curetting ..	97		Aspirating Pleural Cavity	6	
(b) Fixation Uterus ..	3		Removal of Non-Malignant New		
(c) Amputation of Cervix	3	1	Growth ..	11	
(d) Preparing Perineum	1		Delivery forcible dilation and ver-		
(e) Removal of Urethral Car-			sion ..	1	
uncle ..	1		Epulis ..	1	
(f) Rupture, extraction of	1		Caesarean Section ..	3	1
(g) Retained Placenta	2		Craniotomy ..	1	
Rectum and Anus—			Reuniting Epiphysis of Ulna	1	
(a) Fistula in Ano ..	5		Counter opening ..	1	
(b) Stricture of ..	4		Shortening round Ligament	1	
(c) Hæmorrhoids, Ther-			Neurotomy, Sciatica in Thumb	1	
mocautery ..	14		Malignant New Growth	1	
Nails removed ..	30		Aspirating Knee Joint ..	2	
Plastic Operation—			Removal of External Hæmorrhoids	1	
(a) Arm ..	3		Incision of Septic Wound	1	
(b) Scrotum ..	2				
(c) Leg ..	1				
(d) Breast ..	1				
Dislocations—				2,798	39
(a) Shoulder ..	7				
(b) Finger ..	1				
(c) Wrist ..	1				
(d) Knee ..	1				
(e) Thumb ..	1				
Incisions, Cellulitis and Car-					
buncle ..	51				
			Total number of Cases	2,798	
			Total number of Deaths	39	
			Death rate ..	1.394	

I have the honour to be,
Sir,
Your obedient servant,

J. ERRINGTON KER,
Superintending Medical Officer.

The Hon.
The Acting Colonial Secretary,
Kingston.

Annual Report on the work carried out in the Government Bacteriological Laboratory, April 1916 to March, 1917.

Pathological Laboratory, Public Hospital,
Kingston, Jamaica, 28th April, 1917.

The Honourable,
The Superintending Medical Officer.

Sir,

I have the honour to report upon the work done during the official year, April 1st, 1916, to March 31st 1917.

Until October 28th, 1916, Dr. Catto, the assistant Bacteriologist, was in charge. He then went on leave and Dr. C. A. H. Thomson, one of the Resident Medical Officers at the Public Hospital, was detailed to superintend the work pending the return of Dr. Catto. The latter having resigned his appointment in January of the present year, I received orders of recall from England where I was serving with the R.A.M.C. and returned to Jamaica on March 5th and resumed charge of the Laboratory the following day.

During the time that Dr. Catto was acting he carried out some research work on the disease which goes by the name of Peripheral Neuritis in this Island, but in the interval between his departure and my return no special investigation or research work appears to have been attempted, Dr. Thomson's time being probably all taken up in coping with the routine work.

During the last three weeks of the year I have been engaged in two investigations a brief report of which will be given later.

The appended table (table 1.) shows that 12,572 specimens have been dealt with, and the nature of the examinations is given in the same table.

For purposes of description the various examinations will be spoken of under the following groups:—

1. Examination of sera by Widal's agglutination tests for the diagnosis of Enteric Fever.
2. Blood examinations for Malaria, leucocyte counts, etc.
3. Examination of Faeces for
 - (1) Helminth infection.
 - (2) Dysentery and Typhoid carriers.
4. Examination of Urines, Sputa & Pus.
5. Examination of Rats for signs of Plague.
6. Special post-mortem examinations.
7. Tissues, either taken from the last or sent up for examination and report.
8. Water analyses.
9. Miscellaneous, including Wassermann reactions, examination of puncture fluids, exudations, swabs for the bacillus of diphtheria, blood stains and so forth.

Special Addenda:—

1. Peripheral Neuritis.
2. Brief remarks on the so-called "Vomiting Sickness."
3. Preliminary communication on an outbreak of Myelitis (?) at Spanish Town.

Taking the most important of these various matters in the above order.

1. ROUTINE WORK.

1. *Widal Examinations.*—The number of sera sent up for examination for agglutination of organisms of the Typhoid group amounted to 1,302.

During the latter part of March, 1917, a large number was sent from the Penitentiary. This must not be interpreted as meaning that Enteric Fever has been more than usually rife during the month. These from the Penitentiary were taken from apparently healthy subjects. In order to safeguard the preparation of food, examinations as to the bakers and others in analogous employments being possible carriers of disease are made prior to the men being employed for such purposes, and as a preliminary the blood is sent up to be tested for agglutinin formation.

Of the 1,302 sera tested 486 or 37.40% yielded positive results, 696 or 53.45% were negative, while the remaining 119 or 9.15% were doubtful.

The majority, practically two-thirds of the specimens, have been sent from Kingston and the Public Hospital, viz., 861, of which 33.45% were positive, 56.30% were negative, the remaining 10.25% being doubtful.

Under the heading of "doubtful" are placed those giving incomplete agglutination usually from the specimens being sent up early before agglutinins have had time to develop. The figure is higher in Kingston than the country owing to the fact that with the Laboratory in the town specimens are sent up earlier in the disease in greater numbers from clinically dubious cases, since Enteric Fever is common, far too common, in Kingston.

Of the 76 sent up from apparently healthy subjects at the Penitentiary during the last fortnight in March 18 gave a positive result. No definite history, so far as I am aware, was obtained of a previous attack of Enteric Fever in these cases. This accords with the statements in my paper on this subject published in the *Annals of Tropical Medicine* in 1915.

The examination is, therefore, a wise precaution before employing men in the preparation and handling of food.

2. *Blood examinations for Malarial Parasites, etc.*—Of the 1,555 blood smears examined 1,547 were for the detection of Malarial Parasites. Some 300—350 of these were from persons in health emigrating to Cuba, who have to furnish the Steamship Company with a certificate stating that their blood does not show the presence of a malarial infection.

3. (a) *Examination of Faeces for ova of Helminths.*—A total of 5,261 specimens have been examined for this purpose during the year and of these only 1,012 were free from infection, that is 80.77% contained ova of some sort.

With respect to Ankylostome, the most important in its deleterious effects on the working population, this parasite was found in no less than 3,575 instances or 67.93%.

Seeing that these figures include both those who, being found positive at one examination, are re-examined after treatment, and also some of the non-labouring class who, wishing to leave the island, have to produce a certificate that they are free from Hookworm infection, the percentage among the actual labourers is probably higher; but the most serious point is that during the last 18 months, in spite of treatment the figures show a tendency rather to go up. Thus in the period October 1915 to March, 1916, the percentage of examinations revealing ankylostome ova was 68.28, during the next similar period 63.84, while in the last 6 months, October 1916 to March, 1917, the number works out at 72.89%.

3. (2) *Examination of faeces for Amoebae or bacilli of Dysentery and for B. Typhosus.*—Much attention has been paid in the past, and quite rightly, to the question of Typhoid carriers, but the first of the examinations under this head, viz., the search for Amoebic carriers has furnished results which must be earnestly regarded as a note of warning.

191 specimens were examined for Amœbæ and the dysenteric protozoa (in vegetative or encysted stage) were found in 89.

It may be remembered that only a short time ago, 3 or 4 years (as mentioned in a former report from the Laboratory), it was erroneously believed that amoebic dysentery did not exist in Jamaica. The above results show that it is a menace now and likely to become much more serious when the troops return from the front, for a large number of the dysenteric cases from the Eastern theatre of the War at least are amœbic.

The remainder of the routine work has been such as is common to all laboratories and does not call for any detailed description; the numbers of each variety dealt with are shown in Table 1.

2. RESEARCH WORK & SPECIAL INVESTIGATION.

1. *Peripheral Neuritis.*—Dr. Catto had begun an enquiry into this condition towards the end of the last official year. He described five cases which he saw during life. One of them died at the Poor House, and he performed the autopsy and took numerous specimens which he described in a report to the Secretary of State.

The morbid anatomy need not be described in detail here, but after stating his findings he drew the following conclusions which I quote from his report:—

1. "The post-mortem findings in cases of so-called Peripheral Neuritis in Jamaica indicate a 'widespread degeneration of all the elements of the Nervous System, Central as well as Peripheral.

2. "The process does not preferably attack any particular tract in the Spinal Cord.

3. "In this and other respects the disease is closely allied to Pellagra though clinically very distinct.

4. "A study of this condition, which we know to be confined to the lowest classes of the creole population—a population that necessarily lives on a restricted diet—may yield very valuable support 'to the deficiency theory and eventually lead to a determination of the Causa Causans both as regards 'Neuritis itself and Pellagra.

5. "Viewed in the light of recent experimental results this restricted diet is of a nature likely to produce detrimental effects in the human organism, especially on the Nervous System."

2. *Brief remarks on the so-called Vomiting Sickness.*—During the early part of February this affection was widespread in the Duncans District of Trelawny Parish. The District Medical Officer then wrote to the Parochial Board announcing the fact and the latter communicated with his Excellency the Governor, who ordered me to go there and investigate conditions on March 23rd. The outbreak had ceased entirely so that I had not the good fortune to see any actual cases, but I inspected the District, interviewed survivors and the relatives of those who had succumbed and visited all the places in the locality where cases had occurred.

Several of the cases had not been the true Vomiting Sickness at all: for example:

An infant, M.S., had vomited, it is true, but from the age of two months she had been fed most injudiciously on yam, bananas, and so forth. Vomiting only occurred after the giving of food, and had not been accompanied by any convulsions, coma, or other signs of the Vomiting Sickness. I saw the child and, in addition to its stomach troubles, it was teething. On explaining the feeding question to the mother, and regulating the diet, vomiting ceased altogether.

In another instance again the only symptom was vomiting. The mother noticed worms in the stool and in the vomit (?) and administered a "worm powder" and the child recovered completely.

Both these were reported as suffering from the Vomiting Sickness.

Eliciting the history of true cases is in the majority of instances a difficult matter; the sequence of events in this respect is usually as follows:—

First, a flat and universal denial of the use of ackees as food. This, I am convinced arises partly from fear that trouble may follow if the use of a dangerous food or food in an unsafe condition is proved.

Next, on pointing out the fact that ackee trees are growing in the yard, they admit this but strenuously deny that any of them would dream of eating the fruit.

Then comes the stage of admitting that they themselves, the adults, ate them on the day in question, but that they were most careful that the children had none, and finally, on being assured that no prosecution will follow, that the death of the children will not at this interval of time be visited upon their heads, the admission is made that though they did not give them any or a very little of the fruit, the children drank the pot-water.

Ackees are very numerous in this district, in fact I noticed them in every yard in which cases had occurred. In one instance, where the mother adhered to the statement that she herself had had ackees but had not given any to the children, there were two trees in the yard, one some 4 to 5 yards from her hut, the other actually overhanging her door. The patients in this instance were aged 7 and 5 years, respectively, and well able to have obtained the fruit themselves from the ground.

I am inclined to ascribe the severity of the outbreak to the fact that, owing to the recent hurricane, bananas are very scarce, and the presence of the affection in this district year after year may be due to the scarcity of breadfruit in this locality.

Instead of giving a categorical denial of the fact of ackee poisoning, many more are now coming to recognise the possibility and further questioning when cases of Vomiting Sickness occur reveals in greater numbers the fact that this fruit formed one of the constituents of the meal preceding the onset of illness.

The history is often exceedingly difficult to obtain as the following brief recital of three cases will show:—

1. Two children, aged 11 and 7 years, out of a family of 9 suddenly began to vomit on March 14th (a Wednesday). This recurred and after an interval was succeeded by convulsions and coma which terminated fatally early the next day. The symptoms being those of ackee poisoning, the mother was questioned, but stated emphatically that all the children had been with her for 4 days prior to the onset of illness, that they had not gone to school or left the house because she was washing their clothes and they had nothing to put on. She owned that there was an ackee tree in the yard, but it had ceased bearing some time previously. This seemed to exclude ackee altogether. However, as the Medical Officer was unable to certify the cause of death a post-mortem was ordered, which I performed the same day. The conditions found were those already mentioned in former papers and reports and detailed in my monograph in the *Annals of Tropical Medicine and Parasitology* in 1916.

On opening the stomach fragments of ackee were present. Further questioning the mother with this proof in evidence elicited the statement that she had sent these two children (and only these) to the market on the morning of the day on which they were taken ill, and that “they *may* have obtained the fruit there.”!

The third case was the child of a woman in much better circumstances. To save vain repetition it will suffice to say that this child suffered from the same symptoms as those just related and died in 12 hours from the onset. Here again ackee eating was denied. On three separate occasions after the death the doctor in charge of the case interviewed the mother who persisted in her denial. Later on she asked whether “if the child had taken ackees” any trouble would follow for her. It was only on being assured that the matter was finished with that she stated that on the day in question she had sent her servant boy to get ackees from her tree, and that the boy had called to her after some minutes to come and take away the child as she was picking up and eating unripe (unopened) fruit.

3. *Preliminary communication on an outbreak of Myelitis (?) at Spanish Town.*—On Wednesday, March 28th, Dr. C. Redwood White wrote to the Superintending Medical Officer that there was an epidemic of a peculiar nature occurring at Spanish Town, that it differed from any condition with which he was familiar, and that some of the cases were terminating fatally. I was ordered to proceed to Spanish Town which I did the following day.

I saw and examined nine cases then in the hospital; the history of the onset was in all instances the same.

Comparatively suddenly there is feeling of itching in the eyes, sometimes both together, sometimes in one for a day or so before the other. The eyes then become bloodshot and the patients suffer from photophobia. After three or four days there is marked chemosis and a swollen, red, oedematous condition of the conjunctiva, both ocular and palpebral.

The edges of the lids are abraded and small ulcerous spots develop and pus forms.

From 4 to 7 days after the onset of the eye symptoms there is a burning sensation in the mouth (rarely is the tongue affected) and for 24 hours eating is painful; after that the mucous membrane is red and inflamed and aphthae may be seen on it, but the taking of food no longer causes pain. At the angles of the mouth an ulcer is usually seen. Salivation is not common, I only saw it once in the nine cases examined.

The eye condition clears up in a few days by the use of Ung. Hydrarg. Flav. and the mouth with chlorate of Potash and a Boric acid mouth wash. Thus far this history is practically always the same. One stated that the mouth was affected before the eyes.

In another week, that is, about 14 days after the onset, further symptoms declare themselves, and now two quite distinct types of the affection appear.

1. *With intestinal symptoms*—loose actions increasing in frequency to as many as 25 in the 24 hours. Some of the patients die, apparently from exhaustion, others slowly recover. No treatment seems to affect the diarrhoea which appears rather to cease gradually and spontaneously.

2. *With Nervous symptoms.*—These cases are constipated. Dr. White tells me that in none of the diarrhoeic patients has he seen any nervous symptoms develop, and vice versa in all those with nervous system affection constipation is the rule.

The patient states that he feels a sense of numbness and tingling starting at the soles of the feet, occasionally a feeling of “heat”, spreading over the dorsum and up the legs to the knees and sometimes hips; more often the former only. Both limbs are affected together. There is also a complaint of “pain” in the knees, but this is only experienced when movement of the joint is carried out. Palpation is quite painless and there is no heat or swelling, in fact no objective sign of any joint trouble.

Walking is a little difficult the first day but in 24 to 36 hours or so the “numbness” has spread up to the knees or higher and walking is quite impossible.

The patient cannot stand unless supported, there is very marked incoordination, and the patient has no control whatever over the lower limbs. When supported and when getting out of bed the legs are thrown about with a very exaggerated movement, and the gait may be typically tabetic.

At this stage there is *no loss of power*; the knee jerks and other *deep reflexes* are quite abolished and in spite of the complaint of numbness no alteration of sensation could be detected objectively. With eyes bandaged, the response to finger touch, to cotton wool, to pin point and pin-head were correctly estimated and localised.

Two of the patients, who had been in this condition on one day, within 24 hours began to complain of similar “numbness” in the fingers and palms of the hands and the forearms were “feeling funny” also. Here too no alteration of sensation could be detected objectively. None of these so far has had any involvement of sphincters.

Two of the patients (with the nervous form) complained of pain in the stomach, and one of these

whose gait was ataxic, but not the exaggerated stamp of the tabetic, volunteered the information that the pain was as if some one was pulling a rope tight round her chest. The pain was not aggravated by food, which she took well.

To recapitulate, I will narrate in chronological order the sequence of events in the worst case which I saw.

The onset and course were rather slower than in the other patients.

G.P., male, aged 36 years, quite well till 20th February.

20th Feb. Right eye "burning and itching;" later left eye similarly affected.

22nd Feb. Mouth "burning."

3-5 Mar. Feet began to feel numb.

14th Mar. Last time of being able to walk without much difficulty.

20th Mar. Quite unable to walk.

24th Mar. Numbness in fingers.

28th Mar. Present condition; totally unable to walk or get out of bed by himself; marked ataxia of legs, slight in arms; practically no loss of power, no wasting of muscles; reflexes—knee jerks, ankle jerks, wrist, triceps, etc.—quite absent.

In none could I detect any signs at present of cranial nerve involvement.

I have taken specimens of the blood, of secretion from the eyes and mouth and from the aphthæ, urines and faeces of several, but have not yet finished examining them. I hope to be able to examine a cases of each variety post-mortem in order to obtain specimens which may elucidate this interesting condition.

It would be premature even to hazard a conjecture as to the nature of this affection at the present time. Arguing from the symptomatic basis merely, it would appear to be an acute infective condition starting at the mucous membranes of the eyes and mouth and then either passes to the intestines or, gaining access to the nervous system, acts first or mostly upon the root-zone area of the cord (analogous possibly to Anterior poliomyelitis on the anterior cornual cells).

The earlier symptoms are suggestive of foot and mouth disease, but this affection does not, so far as I am aware, exist out here and these patients were not employed with cattle or sheep but work on the cane and banana plantations. It differs from Alastrim amas in the absence of any rash and in the development of the nervous symptoms.

I have the honour to be,

Sir,

Your obedient servant,

H. H. Scott, M.D., M.R.C.P., Lond. D.P.H.,
Government Pathologist.

TABLE I.—Showing the numbers of Specimens examined month by month 1916-1917.

	April	May.	June.	July.	August.	September.	October.	November.	December.	January.	February.	March.	Totals.
Widals	82	110	95	114	111	112	111	102	100	117	91	157	1,302
Faeces for Helminthiasis	409	442	623	432	416	548	645	497	420	198	292	339	5,261
Faeces for Dysentery	29	37	42	30	16	18	39	40	48	15	28	39	381
Blood Smears	63	72	137	188	156	119	156	149	115	170	119	111	1,555
Pus Smears	14	7	9	6	17	9	9	8	6	21	9	5	120
Urines	67	56	52	55	56	35	51	66	43	36	28	43	588
Sputa	46	47	34	36	31	53	31	28	33	53	32	67	491
Tissues	5	8	4	10	5	7	45	5	3	2	5	5	104
Waters	7	8	11	15	9	1	20	14	9	6	12	13	125
Autopsies	4	6	1	3	6	3	5	4	3	1	9	10	55
Rats	93	91	115	143	108	247	261	190	197	78	129	43	1,695
Miscellaneous	71	62	41	105	52	75	125	75	56	93	71	69	895
Totals	890	946	1,164	1,137	983	1,227	1,498	1,178	1,033	790	825	901	12,572

TABLE II.—Number of Sera examined by Widal's Test for Enteric Fever, month by month, with results, 1916-1917.

Month.		Total.	Positive.	Negative.	Doubtful.
<hr/>					
1916—					
April	..	82	38	39	5
May	..	110	43	55	12
June	..	95	39	50	6
July	..	114	48	56	10
August	..	111	31	69	11
September	..	112	36	58	18
October	..	111	33	71	7
November	..	102	40	50	12
December	..	100	49	42	9
<hr/>					
1917—					
January	..	117	42	65	10
February	..	91	30	53	8
March	..	157	58	88	11
<hr/>					
Totals	..	678	252	369	57
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TABLE III.—Examinations of Sera sent up from Kingston, with percentage results month by month and for the whole period, 1916-1917.

Month.		Total.	Percentage Positive.	Percentage Negative.	Percentage Doubtful.
<hr/>					
April	..	51	41.17	52.94	5.89
May	..	69	34.78	50.72	14.49
June	..	63	41.55	51.74	7.07
July	..	76	31.57	56.57	11.72
August	..	78	25.65	64.10	10.25
September	..	72	22.22	59.72	18.05
October	..	56	26.78	64.28	8.92
November	..	52	32.69	57.69	9.61
December	..	62	43.54	43.54	12.90
<hr/>					
1917—					
January	..	87	32.18	59.77	8.04
February	..	62	24.19	62.91	11.11
March	..	133	39.09	54.13	6.76
<hr/>					
Totals	..	861	33.21	56.44	10.33
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TABLE IV.—Districts from which blood has been sent for diagnosis of Enteric Fever, with results, 1916-1917.

District.	Positive.	Negative.	Doubtful.	Total.
Kingston and Hospital	286	486	89	861
Spanish Town ..	45	30	7	82
Port Antonio ..	26	35	3	64
Buff Bay ..	25	32	3	60
Linstead ..	17	21	3	41
St. Ann's Bay ..	15	16	—	31
Mandeville ..	14	13	2	29
St. Andrew ..	12	13	3	28
Morant Bay ..	13	8	1	22
Plantain Garden River	2	12	—	14
Chapelton ..	7	4	2	13
Lucca ..	3	7	1	11
Richmond ..	3	7	—	10
Lionel Town ..	2	4	2	8
Falmouth ..	5	2	—	7
Sav.-la-Mar ..	5	—	1	6
Port Maria ..	3	1	1	5
Grange Hill ..	..	4	—	4
Gayle ..	—	2	—	2
Old Harbour ..	1	—	—	1
Montego Bay ..	1	—	—	1
Ulster Spring ..	1	—	—	1
Grand Cayman ..	1	—	—	1
Totals ..	487	697	118	1,302
Percentages ..	37.40	53.53	9.07	—

TABLE V.—Details of Helminthiasis in Specimens sent from various districts, 1916-1917.

District.	No. Sent.	Neg.	Anky. only.	Ascaris only.	Tricho. only.	All Three.	Anky. and Asc.	Anky. and Tricho.	As. and Tricho.
Spanish Town ..	1,538	195	466	54	33	320	261	166	43
Kingston ..	533	251	99	17	50	38	30	31	17
Annotto Bay ..	508	111	274	21	8	12	43	21	18
Buff Bay ..	447	54	182	16	15	56	78	33	13
Lionel Town ..	351	109	102	42	25	9	23	11	30
Port Maria ..	301	39	224	2	4	6	11	14	1
St. Ann's Bay ..	300	25	39	15	6	114	51	26	24
Mandeville ..	226	23	39	24	6	55	46	24	9
Lucca ..	187	14	35	7	19	40	25	32	15
Plantain Garden River	172	31	56	7	12	22	20	15	9
Port Royal ..	156	66	65	8	3	1	11	2	..
Linstead ..	140	12	44	5	5	30	17	19	8
Black River ..	132	44	20	24	12	7	23	..	2
Falmouth ..	131	18	21	11	10	24	7	27	13
Chapelton ..	117	13	17	10	3	35	19	18	2
Others ..	36	7	7	1	3	7	3	5	3
Whole Island ..	5,270	1,012	1,687	264	212	776	668	444	207
Whole Island previous year April, 1915-Mar., 1916 ..	6,503	1,163	1,976	257	307	1,058	764	714	254

TABLE VI.—Percentage of infection by various worms in Districts whence 100 or more Specimens were sent during the year April, 1916-March, 1917, compared with the results of the preceding year.

	No. Sent.	Positive.	Anky. only.	Anky. and in combination.	Ascaris only.	Ascaris and in combination.	Tricho only.	Tricho and in combination.
Spanish Town	1,538	93.82	30.29	78.86	3.51	44.08	2.14	36.54
Kingston	533	52.90	18.57	37.14	3.18	19.12	9.38	25.53
Annotto Bay	508	78.14	53.93	70.07	4.13	18.50	1.57	12.79
Buff Bay	447	87.91	42.95	80.31	3.57	36.46	3.35	26.17
Lionel Town	351	68.66	28.77	41.31	11.96	29.62	7.12	21.36
Port Maria	301	87.04	74.41	84.71	0.66	6.64	1.32	8.30
St. Ann's Bay	300	91.66	13.00	76.66	5.00	68.00	2.00	56.66
Mandeville	226	89.82	17.25	72.56	10.61	59.29	2.65	41.59
Lucea	187	92.51	18.71	70.58	3.74	46.52	10.16	56.68
Plantain Garden River ..	172	81.97	32.55	65.69	4.06	20.81	6.97	33.72
Port Royal	156	57.69	41.66	50.64	5.12	12.82	1.92	3.84
Linstead	140	91.42	31.42	78.57	3.57	42.85	3.57	44.28
Black River	132	66.66	15.15	37.87	18.18	42.42	9.09	15.90
Falmouth	131	86.25	16.04	58.01	8.39	41.98	7.63	56.48
Chapelton	117	88.88	14.52	76.06	8.54	56.40	2.56	49.57
Whole Island	5,270	80.79	32.01	67.83	5.00	36.33	4.02	31.10
Whole Island previous year 1915-1916	6,503	82.11	33.85	69.38	3.95	35.87	4.72	35.87

TABLE VII.—Relative percentages of varieties of worms present in positive specimens, i.e., percentage of infection based upon positive results, April, 1916-1917.

Districts.	No. sent.	Positive.	Anky. only	Anky. and in combination.	Ascaris only.	Ascaris and in combination.	Tricho only.	Tricho and in combination.
Spanish Town	1,538	1,443	32.29	84.06	3.74	46.98	2.28	38.94
Kingston	533	282	35.10	70.21	6.02	36.17	17.73	48.22
Annotto Bay	508	397	69.10	88.16	5.28	23.67	2.01	14.86
Buff Bay	447	393	46.31	88.80	4.07	41.47	3.81	29.77
Lionel Town	351	242	42.14	59.91	17.35	42.97	10.33	30.99
Port Maria	301	262	85.94	97.32	0.76	7.63	1.52	9.54
St. Ann's Bay	300	275	14.18	83.60	5.45	74.18	2.18	62.58
Mandeville	226	203	19.11	80.78	11.33	68.47	2.95	46.30
Lucea	187	173	20.23	76.30	4.04	50.28	10.98	61.27
Plantain Garden River ..	172	141	39.71	80.14	4.96	30.49	8.51	41.13
Port Royal	156	90	72.22	87.77	8.88	22.22	3.33	6.66
Linstead	140	128	34.37	85.93	3.98	46.87	3.98	58.43
Black River	132	88	22.72	56.81	27.27	63.63	13.63	23.86
Falmouth	131	113	18.58	67.25	9.73	48.67	8.84	65.48
Chapelton	117	104	16.34	85.57	9.61	63.33	2.88	55.76
Whole Island	5,270	4,258	39.61	83.95	6.20	44.97	4.97	38.49
Whole Island previous year 1915-1916	6,503	5,340	37.00	84.49	4.81	43.68	5.74	43.68

PUBLIC HOSPITAL.

Report for the year ended 31st March, 1917.

Island Medical Office, Kingston, 19th June, 1917.

No. 858/2348.

Sir,

I have the honour to forward the accompanying Annual Report of the Public Hospital, Kingston, for the financial year ended 31.3.17.

I have, etc.,

J. E. KER,
Suptg. Medical Officer.

The Honourable
The Colonial Secretary,
Kingston.

Public Hospital, Kingston, May 21st, 1917.

Sir,

I have the honour to place before you the Annual Report and Returns of the Medical and Surgical cases treated in this Hospital during the year ending March 31st, 1917.

Table I shows the number of patients treated as in-door patients during the year with results. The total number being 4,184 of which number 262 were still remaining in Hospital at the end of the year.

The total number of deaths from all causes was 470. The average number of beds occupied daily amounted to 248 as against 197 in the previous year.

The daily average of patients in Hospital month by month was as follows:—

1916—					
April,	..	205	October	..	206
May	..	217	November	..	239
June	..	242	December	..	232
July		243	1917—		
August	..	230	January	..	248
September		241	February	..	254
			March	..	268

The total number of beds allowed us is 234, viz:—210 for general cases and 24 for venereal cases.

The above figures shew therefore that the pressure on our accommodation was very heavy during the last three months of the year under review, high water mark having been reached during March, 1917, when the daily average reached 268 being 34 in excess of the number of beds allowed.

The number of applicants for admission who were rejected for various reasons amounted to 3,657 as against 4,597 in the previous year.

Table II gives the average stay, etc., of patients in Hospital.

Table III gives the number of deaths occurring within 12, 24, 48 and 72 hours after admission, viz.: under 12 hours 108; under 24 hours 58; under 48 hours 52 and under 72 hours 40.—Total 258.

The total death rate from all causes for the year was 11.23%.

As I anticipate that this death rate may be considered high I must point out that of the 470 who died, 258 (more than half) died within 72 hours after admission and of these no less than 108 died within 12 hours of admission, the fact being that practically the whole of these were beyond human aid when admitted.

Table IV gives the number of medical cases treated during the year with results.

The most noteworthy were:

(1) *Malaria*—353 cases with 25 deaths as against 397 cases with 19 deaths in the previous year. The majority of the cases occurred in the period from July, 1916 to February, 1917.

(2) *Enteric Fever*—196 cases with 48 deaths as against 142 cases with 34 deaths in the previous year, viz: an increase in the number of cases with a proportionately similar death rate.

(3) *Dysentery*—(Amoebic) 54 cases with 13 deaths, viz: fewer cases than last year, but alas! a higher death rate.

(4) *Pulmonary Tuberculosis*—92 cases with 36 deaths.

(5) *Venereal Diseases*—302 cases with 8 deaths as against 185 cases with 16 deaths in the previous year.

Of the 302 cases treated (as interns) 70 were cases of Syphilis and 232 of gonorrhœa. Other cases of venereal disease have been treated as externs but these are dealt with elsewhere under the heading "Night Cliniques."

The reason for the great increase in the number of this class of case is that during the year the basement of Edward Ward was converted into a ward and equipped with 24 beds. It was opened on July 5th, 1916, and the daily average of patients undergoing treatment in it month by month since the opening has been as follows:—

1916—					
July	..	24.8			
August	..	16.6	1917—		
September		22.4	January	.	23.8
October	..	17.7	February	..	25.8
November		21.8	March	..	25.6
December	..	22.3			

In addition to the above some cases of venereal disease have been treated in the other wards, mostly women, for whom no special ward has yet been provided though the intention is to do so.

(6) *Pneumonia*—This serious disease has been very prevalent throughout the year, more so than in any year that I can remember, except perhaps the year 1907, when owing to a large number of persons being subjected to exposure owing to the great earthquake which occurred in January of that year the disease was prevalent.

This year the disease has occurred mostly as a sequel to measles and chicken pox both of which have been very prevalent through practically the entire year.

Of 161 cases admitted suffering from Pneumonia, 53 terminated fatally.

The greatest number of cases occurred in January 1917, when we dealt with 40 cases, losing 15 of them.

(7) *Influenza*.—This complaint also was prevalent during the year. 122 cases were treated in Hospital with 1 death.

Table V gives the number of Major surgical operations performed during the year and the fact that we lost only 18 cases out of 1,295 operated upon gives us just cause to be proud of and satisfied with our efforts.

Tables VI and VII give the returns of countries and parishes of patients admitted during the year.

Table VIII gives the occupations of patients treated during the year and from this it will be seen that no less than 364 men of the several war contingents which have been raised in the Colony were dealt with here.

The greatest number of these men that were in Hospital at any one time was 75, i.e., on May 30th 1916, on which day or rather evening the Transport "Victoria" arrived with a large number of invalided men on board. The Superintending Medical Officer accompanied by Dr. F. W. Baillie, who was at the time attached to the staff as Supernumerary Medical Officer, met the ship at the pier to select cases that in their judgment should be admitted to Hospital. Under their able management 63 men were so selected and dispatched to Hospital in Motor cars in a remarkably short space of time. The men were received on their arrival here by myself and staff, the Acting Matron Miss Brooks, Mr. Gordon, Chief Dispenser, the Hall Porter, the Acting Warden, a staff of labourers to act as Stretcher Bearers and all available nurses. The Hospital was full at the time and we were called upon suddenly to provide accommodation for 63 very poorly and helpless men. To accomplish this a special effort had to be made and it gives me great satisfaction to state that so well was that effort made that in less than one hour from the time the first motor car arrived the last man of the batch had been put to bed and made comfortable. Had the procedure been rehearsed it could not have been carried out better, so well did everyone concerned carry out his or her duty.

In addition to the men still belonging to the contingents and the invalids mentioned above an amount of work has been done in connection with ex-members of the same force such as examining and reporting on the physical condition of those for pensions, etc.

It will therefore be seen that though not clad in khaki the Medical and other staff of the Hospital are taking a share in the great effort and determination to "keep the flag flying."

Table IX shows the number of prescriptions dispensed for Outpatients, constabulary and the Maternity Hospital, also the number of minor surgical operations outpatient dressings, etc.

This table shows a very marked increase of work done in the outpatient department. The figures for this and the previous year compare as follows:—

	1915-16.	1916-17.
Patients with ticket from Inspector of Poor	543	820
Patients without tickets	8,588	11,728
Minor surgical operations in surgery	287	473
Outpatient dressings applied	28,882	30,583

With regard to the working of the Outpatient Department I think it necessary to state that the space available for the performance of this work consists of a waiting room and one other room or surgery.

At times, especially from 7 a.m. to about 1 p.m. the unavoidable overcrowding is the cause of great inconvenience hindering as it does expedition, and to a great extent efficiency as well. I therefore think that the provision of one or even two more rooms would be of very great advantage.

Table X gives the figures for the 16 Evening Cliniques which had been held up to the end of the year under review.

The total number of cases was 627. The smallest number of patients at any one clinique was 11 on February 7th, 1917, which was the first clinique of the series. The largest number was 90 on the 28th of March, 1917. The average attendance works out at 39.2.

Of the 627 total attendances there were 185 venereals and undoubted syphilitics (132 males and 53 females). At least one half of the others were chronic dyspeptics, rheumatics and women with back-ache—this latter in many instances due to chronic constipation.

285 returned at least once; (up to March 31st, 1917) and more than half of these have returned several times.

The males attend fairly regularly but not so the females.

Early in 1917, the idea was conceived of starting these Evening Cliniques to enable persons suffering from venereal complaints to receive free treatment who for any reason find it inconvenient to attend during the day. The scheme having met with the approval of His Excellency the Governor was soon put into practice, and the 1st clinique was held on Wednesday February 7th, 1917, since when they have been regularly held every Wednesday and Saturday beginning at 6 p.m. In order however that persons suffering from venereal complaints should not be rendered too conspicuous these clinics were thrown open to persons suffering from other complaints as well. That the arrangement has been fairly well taken advantage of the above figures show. Every person treated for venereal disease of any sort is given printed instructions as to how he or she should conduct him or herself so as to assist the treatment in bringing about recovery. A copy of each pamphlet is attached to this report. (See page 14.)

Table XI gives details of cases (venereal) treated in venereal ward and outpatient department.

With regard to the item (in the above table) "Refused to remain in Hospital until cured," it is necessary to state that a number of persons do not seem to realise that venereal disease is a serious matter, and, in consequence, do not persevere with the treatment prescribed and advised, and leave the Hospital (at their own desire) before a cure is effected. The following are two good instances in illustration of the above:—

- (a) On August 16th, 1916, 12 men suffering from venereal disease were sent to hospital from the contingent Camp (they were ex-contingent men) 11 of them claimed their discharge on the same day.

(b) Again on September 15th 23 ex-contingent men were sent suffering from venereal disease. On the 16th six of them left, on the 18th and 19th two left, on the 20th seven left. Consequently of the 23 no less than 15 left the hospital within six days of their admission uncured.

With regard to the item "Salvarsan injections" included in this table I desire to record the fact that the thanks of the hospital are due to Captain Huddleston, R.A.M.C. who very kindly gave demonstrations to some members of the staff in the use and management of a new and improved apparatus (which was then in use at Camp) for giving injections of Salvarsan and other arsenical preparations with a much greater degree of safety than formerly, one of which apparatus we had just then received.

The health of the staff, nurses and employees, has been on the whole good. Some nurses have from time to time suffered from measles or chicken pox. I would here point out that at present we have absolutely no where to isolate cases of infectious or contagious diseases that may break out among nurses or patients and have consequently had to make use of tents pitched in the grounds, an arrangement that has not proved satisfactory. Isolation wards for males and females should be provided for under the present existing circumstances the possibility of an epidemic of contagious or infectious disease sweeping through the Institution is a menace that causes grave and constant anxiety seeing that for want of proper isolation wards we should be handicapped in the attempt to stamp it out at the beginning.

During the year His Excellency the Governor inspected the buildings on two occasions, one of which was the day after the arrival of the disabled men of the third War Contingent. On both occasions he expressed himself as being satisfied with what he saw.

The Board of Official Visitors have also, as usual, visited regularly throughout the year, but have not found serious fault on any occasion.

Lectures and classes for senior and junior nurses have as usual been regularly conducted, and during the year 14 nurses qualified and obtained certificates.

At Xmas Mrs. Park, wife of the Hon. Director of Public Works, undertook to hold a Christmas Tree for the inmates of the children's ward, and so well did her single handed and whole hearted efforts succeed that not only was the tree a great success but she was able to hand over surplus funds sufficient to enable us to import from England a very nice rocking horse and also a boat on rockers. These have arrived and are now in the ward where they met with the appreciation they deserve. I am sure that the thanks of not only the Hospital but of the whole community are due to Mrs. Park.

Early in January Mrs. Ross, assisted by Mrs. Ker, Mrs. F. H. Saunders, Mrs. P. C. Cork, Mrs. H. C. Bourne, Mrs. J. H. Park, Mrs. A. W. Douet and Miss Brooks (acting matron) interested themselves in getting up a treat for the nurses of the Hospital (The nurses from the Jubilee being invited also). The outing took the form of a picnic to Castleton Gardens, but as all the nurses could not be spared from their duties on the same day they were divided into two parties.

So generously was the appeal of the promoters for monetary and other assistance responded to by Merchants and other citizens that the venture was a very decided success, the parties being conveyed to and from the Gardens by Motor Cars kindly lent for the purpose. When it is realized that cars were lent for two days absolutely free of expense and that if it had been necessary to hire them the treat would have to have taken some other and perhaps less enjoyable form it will be seen how great is the debt of gratitude owing to those who so kindly helped by lending their cars. I am sure however that our kind friends will be pleased to hear that the trip was as well enjoyed as it was well deserved.

The thanks of the patients are also due to kind friends who have kept the hospital well supplied with newspapers, periodicals, flowers, etc.

In conclusion I have to place on record the fact that I have received very willing support from everyone with whom I have had the pleasure of being associated in the working of this important Institution during a very strenuous twelve months.

I have, etc.,

G. H. K. Ross,
Acting Senior Medical Officer.
The Dental Laboratory, Public Hospital,
July 11th, 1917.

The Superintending Medical Officer,
Kingston.

Sir,

I have the honour to present the following report on the working of the Dental Department during the year ending 31st March, 1917.

The figures for the year 1915-16 are included for purposes of comparison, over which, it will be observed, the present figures shew a decided increase.

To a great extent this increase has been due to the additional work involved in attending to the N.C.O.s and men of the Jamaica War Contingent. The Medical Officers in charge have not been slow to appreciate the advantages this Department offers to the men and my time has been kept fully occupied in an endeavour to do justice to this important branch of the work.

The normal work of the Department has been of the usual routine character, and with the exception of the increase in quantity which, in view of the high figures for the preceding year, was a gratifying surprise there is nothing to report.

The statement of work follows:—

	1915-16.	1916-17.		1915-16.	1916-17.
Cases treated	2,392	2,778	Removal of necrosed bone	7	4
Extractions	3,236	3,562	Mouth washes (bottles)	121	112
Filling of roots	10	51	Minor surgical operations	15	5
Removal of nerves	10	65	Cleaning and polishing (sets)	12	32
Pyorrhœa and other treatment	155	119	Capping nerves	3	54
Fillings	192	796			

I have, etc.,

S. C. DePass, D.D.S.

The Suptg. Medical Officer,
Kingston.

Financial Return of the Public Hospital for the five years ended 31st March, 1913, 1914, 1915, 1916 and 1917.

Year.	Average daily number of Beds.	Gross Expenditure.	Receipts.	Net expenditure after deducting receipts.	Number of patients admitted.	Average annual cost per bed calculated on the gross expenditure.	Average daily cost per bed calculated on the gross expenditure.	Average annual cost per bed calculated on the net expenditure.	Average daily cost per bed calculated on the net expenditure.	Cost of maintenance alone per bed per diem.
		£ s. d.	£ s. d.	£ s. d.		£ s. d.	£ s. d.	£ s. d.	s. s. d.	s. d.
1912-13	223	10,540 4 6	702 16 1	9,837 8 5	3,199	46 4 3½	0 2 6¼	43 1 3¼	0 2 4¼	0 10¼
1913-14	217	10,692 2 2	741 17 7	9,850 4 7	2,700	48 6 1½	0 2 7¾	44 8 6½	0 2 5	0 10¾
1914-15	207	10,869 4 11	725 15 4	10,143 9 7	2,903	52 10 2	0 2 10½	49 0 0	0 2 8½	0 10¾
1915-16	192	10,417 4 9	862 9 6	9,554 15 3	3,072	54 5 2	0 2 11¾	49 15 3	0 2 8¾	0 10¼
1916-17	236	*11,989 2 10	1,327 13 1	10,661 9 9	3,983	43 13 3	0 2 4¾	39 6 2	0 2 1¼	0 10¾

Total cost of Maintenance	3,870 3 8
Less for feeding of 16 nurses (10 at 5s., and 6 at 3s., per week) in nursing home	176 16 0
	3,693 7 8

*This amount includes £219 7s. 0d., for Hospital probationers, and £356 16s. 0d., for Bumper Hall Hospital and Quarantine Station, to be refunded by Military.

Summary of Financial Year, 1916-1917.

TABLE I.

	Males.	Females.	Total.
Patients remaining in hospital 1st April, 1916	11	289	201
Patients admitted during the year 1916-1917	2,316	1,667	3,983
Total Patients treated ..	2,428	1,756	4,184
Of those were cured	1,556	1,029	2,585
Of those were relieved	352	290	642
Of those were not relieved	117	108	225
Of those died	240	230	470
Remaining in Hospital March, 31st 1917.	163	99	262
	2,428	1,756	4,184

Death rate 11.23%

TABLE II.

Daily average number of beds occupied by male patients	..	149
Daily average number of beds occupied by female patients	..	89
Average stay in days of those who died—males	..	11.24
Average stay in days of those who died—females	..	12.42
Average stay in days of those discharged—males	..	20.56
Average stay in days of those discharged—females	..	19.84
Average stay in days of those remaining at end of year—males	..	31.46
Average stay in days of those remaining at end of year—females	..	29.62
Longest stay of any one patient in hospital ..	..	365

TABLE III.

Patients who have died within the following hours after admission:--

	Hours.				Total
	12	24	48	72	
Males	60	27	24	26	137
Females	48	31	28	14	121
	108	58	52	40	258

TABLE IV.—Public Hospital, Kingston—Model

DISEASE.	April.		May.		June.		July.		August.		September.	
	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.
Enteric Fever	16	3	14	3	18	3	24	6	16	3	15	5
Dysentery	7	2	6	..	5	2	1	..	..	..	6	..
Pneumonia	7	3	12	4	9	2	6	..	7	..	14	2
Influenza	1	..	1	1	1	..	2	..	1	..	6	..
Malarial Fever—												
(a) Tertian .. ..	..	..	..	..	6	..	6	..	6	..	4	..
(b) Sub-Tertian	6	..	10	1	19	2	24	..	28	4	34	2
(c) Quartan .. ..	..	..	..	..	1	..	..	..	3	..	..	..
Tetanus	1	1	1	..	1	1	..	..	..	..	..	..
Pellagra	1	..	..	..	2	1	1	..	2	1	1	..
Erysipelas .. ..	..	..	..	..	..	..	..	..	..	..	..	..
Septicæmia .. ..	..	..	..	..	1	1	..	..	..	..	1	..
Pulmonary Tuberculosis	8	4	8	4	5	3	5	1	8	3	8	5
Syphilis—												
Primary .. ..	..	..	1	..	1	..	..	..	..	..	2	..
Secondary	1	..	..	..	1	..	2	..	2	..	2	..
Tertiary	1	..	1	..	5	1	..	..	3	..	1	..
Congenital .. ..	..	..	1	1	1	..	1	..	..	..	..	..
Gonorrhœa and Sequela	11	1	7	..	16	..	36	..	40	1	43	1
Chancroids	1	..	7	..	7	..	10	..	6	..	6	..
Alcoholism .. ..	..	..	..	..	..	..	..	..	..	..	..	..
Rheumatism	10	1	13	..	2	..	7	..	11	..	5	..
New Growth—												
(a) Malignant	2	..	1	..	3	1	1	1	1	..	3	..
(b) Non-Malignant	2	..	5	2	3	..	2	1	6	1	2	..
Anæmia	2	..	5	..	5	..	..	..	4	1	2	..
Debility	1	..	..	..	..	..	..	..	1	1	1	..
Appendicitis	1	..	1	..	1	..	2	..	..	..	1	..
Whooping Cough .. ..	..	..	..	..	..	..	..	..	..	..	..	..
Beri-Beri	1	..	..	..	..	..	..	..	..	..	..	..
Measles .. ..	..	..	..	..	1	..	2	..	3	..	1	..
Chicken Pox .. ..	..	..	..	..	1	..	4	..	..	..	..	..
Diphtheria .. ..	..	..	..	..	..	..	..	..	..	..	..	..
Mumps	1	..	..	..	..	..	..	..	..	..	..	..
LOCAL DISEASES—												
NERVOUS SYSTEM—												
Brain and Apoplexy	5	1	6	3	4	3	..	..	6	3	4	..
Nerves	13	1	61	2	10	1	3	..	9	2	4	..
Epilepsy .. ..	..	..	..	..	..	..	1	..	2	..	1	..
Spinal Cord .. ..	..	..	..	..	..	..	2	..	2	..	1	..
Paralysis	2	1	..	..	1	..	3	..	2	1	3	1
Hysteria	1	..	..	..	1	..	..	..	..	..	1	..
MENTAL DISEASES—												
Mania .. ..	..	..	1	..	..	..	..	..	..	..	..	..
Dementia .. ..	..	..	..	..	..	..	..	..	..	..	..	..
Melancholia .. ..	..	..	..	..	..	..	..	..	..	..	..	..
DISEASES OF—												
Eye	5	..	11	..	10	..	4	..	4	..	7	..
Ear .. ..	..	..	..	..	1	..	..	..	1	..	1	..
Nose .. ..	..	..	..	..	..	..	..	..	1	..	..	..
Circulatory System	7	3	5	3	5	1	3	1	4	2	3	1
Respiratory System	13	1	11	..	10	..	10	..	10	..	11	1
Digestive System	30	7	33	6	25	5	18	1	22	3	26	1
Lymphatic System	15	..	7	..	11	..	7	..	6	..	15	..
Urinary System	4	..	1	..	9	2	6	..	7	1	11	2
GENERATIVE SYSTEM—												
Male Organs	2	..	5	..	6	..	4	..	10	..	3	..
Female Organs	16	..	13	..	15	1	17	1	12	1	11	..
Cellular Tissue	10	..	8	2	15	..	12	2	11	..	14	..
Skin	9	..	17	1	10	..	8	1	10	1	16	..
Bones and Joints	4	..	27	..	4	..	2	..	7	..	8	1
Local Injuries	22	3	28	1	16	1	12	2	20	2	12	1
Malformation .. ..	..	..	..	..	..	..	..	..	..	..	..	..
Poisons .. ..	..	..	..	..	..	..	..	..	..	..	..	..
No Disease	1	..	7	..	1	..	4	..	9	..	..	..
Parasites	2	..	2	1	2	..	4	1	1	..	4	..
Simple Fever	11	..	7	..	11	..	15	..	15	..	7	..
Peritonitis	3	1	2	..	4	2	4	..	15	..	5	3
Jaundice .. ..	..	..	..	..	2	..	1	..	..	..	1	1
Leprosy .. ..	..	..	..	..	..	..	..	..	..	..	..	..
Vomiting Sickness (so called) .. ..	..	..	..	..	..	..	..	..	1	1	1	1
Dentition .. ..	..	..	..	..	..	..	..	..	..	..	..	..
Total	256	33	346	35	288	33	276	18	335	32	328	28

Report—Nosological Returns, 1916-1917.

October.		November.		December.		January.		February.		March.		Total.	
Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.
10	3	17	3	20	2	23	5	17	10	6	2	196	48
4	..	5	3	6	2	7	1	2	1	5	2	54	13
3	2	4	2	16	5	40	15	20	7	23	11	161	53
20	..	18	..	20	..	31	..	11	..	10	..	122	1
1	..	1	..	1	..	..	..	..	..	..	..	25	..
46	..	36	1	24	..	43	6	36	4	17	5	323	25
..	..	1	..	..	..	..	..	..	..	..	..	5	..
..	..	1	1	..	..	1	1	..	..	1	1	6	5
..	..	1	..	1	..	..	..	3	1	6	2	18	5
..
..	..	1	..	..	..	..	..	..	..	1	1	4	2
6	..	5	2	8	2	9	4	11	1	11	7	92	36
4	..	8	..	3	..	3	..	7	..	2	..	31	..
2	1	3	..	..	..	..	..	..	..	2	..	15	1
1	..	4	..	1	..	1	..	..	..	..	..	18	1
1	1	..	..	1	..	..	..	1	1	..	..	6	3
17	..	16	..	11	..	11	..	14	..	10	..	232	3
2	..	2	..	3	..	2	..	6	..	..	..	52	..
3	..	4	..	1	..	..	..	..	..	..	..	1	..
..	..	..	..	8	..	5	..	4	..	3	..	75	1
4	1	1	..	4	..	1	1	..	..	..	..	21	4
6	1	5	1	1	..	5	2	2	..	1	1	40	9
1	..	1	..	2	..	1	..	..	..	..	..	23	1
1	..	2	..	..	..	..	..	..	..	..	..	6	1
..	..	..	..	2	..	1	..	2	..	..	..	11	..
..
..	..	..	..	..	..	..	..	..	..	..	..	1	..
..	..	2	..	..	..	..	..	..	..	..	..	9	..
..	..	..	..	..	..	..	..	..	..	..	..	5	..
..
..	..	..	..	..	..	..	..	..	..	..	..	1	..
1	1	1	1	5	4	3	1	8	7	12	9	55	33
4	..	7	..	15	3	20	3	18	5	12	3	176	20
2	1	1	..	..	..	..	..	1	..	1	..	9	1
3	..	..	..	..	..	..	..	2	..	..	..	10	..
1	..	1	..	..	..	2	..	1	..	..	..	16	3
..	..	..	..	1	..	..	..	1	..	..	..	5	..
..
2	..	..	..	..	..	..	..	..	..	..	..	1	..
1	..	..	..	..	..	..	..	..	..	..	..	2	..
..	..	..	..	..	..	..	..	..	..	..	..	1	..
5	..	7	..	8	..	1	..	2	..	4	..	68	..
1	1	..	..	..	..	..	..	..	..	1	..	5	1
..	..	..	..	..	..	1	..	..	..	..	..	2	..
6	3	5	1	2	..	4	..	6	1	5	1	55	17
9	1	18	1	9	1	24	..	19	1	17	3	161	9
30	8	39	5	34	3	31	4	33	7	42	18	363	68
5	..	3	..	6	..	7	..	3	..	1	..	86	..
6	3	8	..	3	..	9	2	4	..	..	..	68	10
6	..	6	..	2	..	4	..	8	..	..	..	56	..
18	1	7	..	11	..	9	..	8	..	12	..	149	4
14	1	11	..	10	..	14	..	7	..	7	..	133	5
20	1	16	..	15	..	14	2	11	..	5	..	151	6
5	1	..	4	6	..	6	..	6	1	5	..	84	3
21	4	10	..	18	2	21	..	16	4	7	1	203	21
..	..	..	..	1	1	1	1	..	..	..	..	2	2
..	..	..	..	1	1	..	..	..	..	1	1	2	2
2	..	2	..	3	..	2	..	3	..	4	..	38	..
4	..	6	..	1	..	..	..	3	..	..	..	29	2
26	4	13	..	22	..	19	..	37	3	19	..	202	7
..	..	3	2	2	1	..	..	..	..	..	..	38	9
..	..	..	..	3	..	..	..	..	..	..	..	7	1
..
1	1	..	..	..	..	..	..	2	2	1	1	6	6
..	..	1	..	..	..	..	..	..	..	..	..	1	..
325	40	307	23	311	27	376	48	335	55	254	69	3,737	442

TABLE V.—Public Hospital, Kingston—Model

DISEASE.	April.		May.		June.		July.		August.		September.	
	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.
Abscesses, Incisions of	2	..	4	1	2	..	7	..	6	..	12	..
Abdominal Section for—												
Appendectomy	1	..	..	..	1	..	1	..	1	..	1	..
Ovariectomy .. ..	..	..	..	..	..	..	..	..	..	..	..	..
Oophorectomy (Double) .. ..	..	..	..	..	..	..	..	..	..	..	..	..
Hysterectomy .. ..	..	..	1	..	2	1	..	..	2	1	1	..
Gastro-jyunostomy .. ..	..	..	..	..	..	..	..	..	..	..	..	..
Pyo-Salpynx .. ..	..	..	..	..	1	..	..	..	1	1	..	..
Exploratory Laparotomy	5	..	..	..	1	..	1	..	2	..	..	..
Reduction of Intussusception .. ..	..	..	1	1	..	..	..	..	..	..	..	..
Amputations—												
Leg	1	..	1	..	..	..	..	..	..	..	..	..
Hand .. ..	..	..	..	..	1	1	..	..	..	..	..	..
Breast	1	..	..	..	1	..	..	..	1	..	2	1
Penis .. ..	..	..	..	..	..	..	..	..	..	..	..	..
Finger .. ..	..	..	..	..	..	..	..	..	..	..	..	..
Toe .. ..	..	..	..	..	..	..	1	..	1	..	..	..
Bones—												
Sequestrotomy	3	1	1	..	..	..	..	..	1	..	1	..
Bladder and Urethra—												
Dilatation of Stricture .. ..	..	..	2	..	..	..	2	..	2	..	2	..
Perineal Section .. ..	..	..	1	..	..	..	..	..	..	..	..	..
Suprapubic Optotomy (for Stones) .. ..	..	..	..	..	..	..	..	..	1	..	..	..
Prostatectomy (Freyers) .. ..	..	..	..	..	..	..	..	..	..	..	..	..
Eye, on—												
Enucleation of eyeball	1	..	3	..	1	..	..	..	2	..	2	..
Extraction of Cataract with Ire-	..	..	..	..	..	..	..	..	..	..	..	..
dectomy .. ..	..	..	..	..	..	..	..	..	..	..	..	..
Extraction of Cataract without	..	..	..	..	..	..	..	..	..	..	..	..
Ireductomy .. ..	..	..	..	..	..	..	..	..	..	..	..	..
Face, Nose Mouth—												
Nasal Polypus .. ..	..	..	..	..	..	..	..	..	..	..	..	..
Tonsils	1	..	1	..	1	..	1	..	1	..	1	..
Adenoids	1	..	1	..	..	..	1	..	1	..	3	..
Glands, Removal of—												
Inguinal	4	..	15	..	7	..	8	..	5	..	8	..
Cervical .. ..	..	..	2	..	2	..	..	..	..	..	..	..
Mascillary .. ..	..	..	..	..	1	..	..	..	2	..	1	..
Axillary .. ..	..	..	..	..	..	..	..	..	..	..	1	..
Hernia—												
Radical Cure for	4	..	2	..	..	..	1	..	3	..	..	..
Herniotomy for Strangulated Hernia	1	..	..	..	..	..	..	..	..	..	..	..
Male Generative Organs—												
Radical Cure for Hydrocele .. ..	..	..	1	..	..	..	..	..	..	..	..	..
Radical Cure for Varicocele	2	..	..	..	..	..	..	..	..	..	..	..
Circumcision .. ..	..	..	6	..	11	..	12	..	7	..	10	..
Cauterising Chancroids .. ..	..	..	3	..	4	..	3	..	2	..	3	..
External Urethrotomy .. ..	..	..	..	..	..	..	..	..	1	..	1	..
Female Generative Organs—												
Curetting	7	..	6	..	8	..	8	..	6	..	6	..
Recto-Vaginal Fistula .. ..	..	..	..	..	..	..	..	..	..	..	1	..
Cauterizing Urethral Caruncle .. ..	..	..	..	..	..	..	..	..	..	..	..	..
Amputation of Cervix Uteri	1	..	..	..	..	..	..	..	..	..	..	..
Ventral Fixation .. ..	..	..	1	..	..	..	..	..	..	..	..	..
Rectum and Anus—												
Dilating Rectal Stricture .. ..	..	..	1	..	1	..	..	..	..	..	2	..
Hæmorrhoids	1	..	1	..	1	..	2	..	2	..	..	..
Fistula in Ano .. ..	..	..	3	..	1	..	..	..	1	..	..	..
Removal of Toenails .. ..	..	..	..	..	1	..	..	..	1	..	..	..
Trephining for Compound depressed												
Fracture of Skull .. ..	..	..	..	..	..	..	..	..	1	..	..	..

Report—Nosological Return, Operation, 1916-1917.

October		November.		December		January.		February.		March.		Total.	
Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.
5	..	3	..	7	..	7	1	6	..	8	..	69	3
..	1	..	1	..	2	..	..	..	9	..
..	..	1	..	..	..	1	..	1	..	..	..	3	..
1	1	..
2	1	..	..	1	1	1	..	2	1	2	2	14	7
..	1	1	1	1
..	2	..	..	..	1	..	..	..	5	1
1	1	..	..	2	..	..	..	2	..	2	..	16	1
..	1	..	..	..	..	..	2	1
2	1	..	4	..
..	1	..	1	..	..	..	1	..	2	1
2	..	1	..	..	..	..	..	..	..	..	..	8	1
2	..	1	..	1	..	..	..	2	..	..	..	3	..
2	..	3	..	1	..	..	..	1	..	..	..	6	..
..	9	..
1	..	2	..	..	..	..	..	..	..	1	..	10	1
..	2	..	4	..	1	..	2	..	17	..
..	..	1	..	..	..	..	..	1	..	..	..	3	..
1	1	..
4	1	..	2	..	3	..	19	..
..	..	5	..	..	..	..	..	..	..	4	..	9	..
2	2	..
..	..	1	..	..	..	..	..	..	..	1	..	2	..
1	..	1	..	..	..	1	..	2	..	2	..	13	..
1	..	2	..	..	..	1	..	4	..	3	..	18	..
5	..	11	..	9	..	5	..	13	..	9	..	99	..
1	1	..	..	..	1	..	7	..
..	1	..	1	..	6	..
1	1	..	1	..	4	..
..	..	3	..	1	..	1	..	1	..	2	..	18	..
..	..	1	..	..	..	..	..	..	..	1	..	..	3
1	..	1	..	1	..	1	..	1	..	1	..	7	..
5	..	6	..	3	..	1	..	10	..	12	..	2	..
1	..	1	..	..	..	..	..	4	..	3	..	83	..
..	24	..
7	..	7	..	3	..	8	..	6	..	6	..	2	..
1	76	..
..	1	..
..	1	..	..	1	2	..
..	1	2	..
..	..	2	..	..	..	3	..	..	..	..	..	9	..
..	..	1	..	..	..	..	..	..	..	1	..	9	..
1	..	1	..	..	..	..	..	..	..	..	..	7	..
1	..	1	..	..	..	..	..	..	..	1	..	5	..
..	1	..

TABLE V., eontd.—Public Hospital, Kingston—Model

DISEASE.	April.		May.		June.		July.		August.		September.	
	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.
Tumors and Cysts—												
Prepatella Bursa ..	1	..	..	..	..	..	1	..	..	..	..	..
Melbomian Cyst ..	..	..	..	..	..	..	1	..	..	..	1	..
Lipoma ..	..	..	..	..	..	..	..	..	1	..	1	..
Fibroma ..	..	..	..	..	1	..	..	..	..	..	1	..
Cystic Tumour ..	1	..	2	..	2	..	..	..	..	..	1	..
Ganglion ..	1	..	..	..	1	..	1	..	1	..	..	..
Sebaceous Cyst ..	..	..	..	..	..	..	1	..	..	..	..	..
Miscellaneous—												
Examination ..	1	..	..	..	1	..	..	..	1	..	2	..
Scraping Chronic Ulcers ..	1	..	1	..	1	..	2	..	1	..	2	..
Scraping Sinuses ..	..	..	..	..	3	..	..	..	1	..	..	..
Ligaturing Varicose Veins ..	..	..	..	..	2	..	..	..	..	..	..	..
Excision of Carbuncle ..	..	..	..	..	..	..	..	..	..	..	..	..
Extraction of Bullet ..	..	..	..	..	..	..	1	..	..	..	..	..
Removal of Warts ..	..	..	..	..	..	..	1	..	..	..	..	..
Exploratory Incisions ..	1	..	..	..	..	..	1	..	..	..	1	..
Ligaturing Arteries ..	..	..	..	..	1	..	1	1	..	..	..	..
Minor Operation performed Sine Chloroform—												
Incisions of Abscesses ..	20	..	16	..	28	..	16	..	18	..	12	..
Removal of Foreign Bodies ..	2	..	1	..	8	..	6	..	8	..	5	..
Dilatation of Stricture ..	8	..	2	..	8	..	5	..	7	..	3	..
Tapping Hydrocele ..	..	..	2	..	4	..	4	..	4	..	2	..
Removal of Tonsils ..	4	..	..	..	6	..	7	..	3	..	6	..
Reducing Dislocations ..	1	..	1	..	3	..	2	..	1	..	1	..
Setting Fractures ..	2	..	..	..	1	..	2	..	3	..	1	..
Removal of Pterygium ..	..	..	..	..	..	..	..	..	1	..	1	..
Reducing Paraphymosis ..	1	..	..	..	2	..	1	..	1	..	1	..
Paracentesis Abdominis ..	1	..	..	..	2	..	1	..	1	..	..	..
Grand Total ..	81	1	82	1	122	2	98	2	104	2	100	2

Report—Nosological Returns, Operation, 1916-1917

October.		November.		December.		January.		February.		March.		Total.	
Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.
1	3	..
..	..	1	..	1	..	2	..	1	..	1	..	2	..
1	1	..	9	..
1	2	..	1	..	..	..	1	..	4	..
2	11	..
..	6	..
..	1	..
..	..	13	..	..	..	..	..	1	..	..	..	9	..
2	..	2	..	2	..	2	..	2	..	1	..	19	..
..	..	1	..	..	..	..	..	..	..	..	..	5	..
..	1	..	..	..	..	..	2	..
..	1	..	2	..
..	..	2	..	..	..	..	..	..	..	2	..	1	..
..	1	..	1	..	1	..	..	..	5	..
..	5	..
..	2	1
32	..	30	..	36	..	16	..	10	..	19	..	253	..
8	..	4	..	4	..	6	..	4	..	8	..	64	..
10	..	18	..	16	..	10	..	5	..	11	..	103	..
4	..	6	..	6	..	2	..	1	..	4	..	39	..
4	..	4	..	4	..	12	..	8	..	16	..	74	..
2	..	4	..	4	..	1	..	1	..	1	..	22	..
1	..	1	..	2	..	1	..	..	..	..	..	14	..
1	..	2	..	1	..	..	..	1	..	2	..	9	..
..	..	3	..	..	..	2	..	1	..	3	..	14	..
1	..	2	..	1	..	1	..	1	..	2	..	13	..
121	2	129	..	115	1	97	1	102	1	144	3	1,295	18

TABLE VI.

Countries	No.
Africa	1
America	1
Antigua	1
Arabia	1
Australia	3
Austria	1
Bahamas	21
Barbados	9
Canada	1
China	5
Colombia	7
Demerara	2
England	37
Egypt	1
France	1
Finland	2
Grand Cayman ..	4
India	52
Ireland	7
Italy	1
Jamaica	3,806
Mauritius	1
Newfoundland ..	1
Norway	2
Portugal	1
Russia	1
St. Lucia	1
Scotland	6
Syria	1
Trinidad	2
Turks Island ..	3
Total	3,983

TABLE VII.

Parishes	No.
Kingston	2,447
Port Royal	34
St. Andrew	1,263
St. Thomas	21
Portland	12
St. Mary	21
St. Ann	13
Trelawny	3
St. James	4
Hanover	5
Westmoreland ..	6
St. Elizabeth ..	10
Manchester	9
Clarendon	15
St. Catherine ..	54
Foreign	66
Total	3,983

TABLE VIII.

Occupations.	No.
Accountants	4
Apiarists	1
Apprentices	17
Bakers	20
Bailiffs	1
Barbers	3

TABLE VIII., contd.

Occupation.	No.
Blacksmiths	7
Boatmen	4
Boilermakers	2
Brakesmen	5
Brewers	1
Bricklayers	15
Busmen	6
Butchers	7
Butlers	4
Cabinetmakers ..	4
Cakesellers	2
Carpenters	54
Cartmen	14
Chauffeurs	5
Cigarmakers	2
Clerks	49
Coachmen	18
Compositors	2
Conductors	5
Constables	322
Contractors	1
Cooks	17
Coopers	4
Coppersmiths	2
Draymen	3
Dispensers	2
Electricians	1
Engineers	9
Enginedrivers ..	2
Firemen	21
Fishermen	32
Fitters	16
Foremen	1
Gardeners	9
Goldsmiths	1
Grooms	3
Hatmakers	21
Higglers	124
House cleaners ..	1
Jockeys	1
Journalists	1
Labourers	593
Laundresses	304
Machinists	12
Mail Carriers ..	1
Masons	1
Mechanics	7
Militiamen	30
Merchants	1
Messengers	7
Motormen	2
Musicians	1
None	879
Nurse	61
Overseers	2
Painters	13
Peddlers	12
Physicians	1
Photographers ..	2
Planters	63
Plumbers	3
Porters	3
Postmistresses ..	2
Postmen	2
Printers	3
Renovators	2
Saddlers	2
Schoolmasters ..	15
Seamen	47
Seamstresses ..	189

TABLE VIII., contd.

Occupations.	No.	Occupations.	No.
Servants	401	Tailors	32
Shipwrights	1	Telegraph Operators	1
Shoemakers	37	Tinsmiths	3
Shopkeepers	8	Tobacconists	2
Shopservers	6	Trimmers	2
Stewards	4	Upholsterers	3
Storekeepers	1	Volunteers	364
Storemen	5	Wheelwrights	3
Signalmen	1		
Surgeons (Vet.)	3	Total	3,983

TABLE IX.

No. of patients treated under tickets from Inspector of Poor	820
“ prescriptions made up for above	5,706
“ Casualties treated without tickets	11,728
“ Prescriptions for above	7,036
“ “ made up for Constabulary	1,030
“ Minor Surgical operations performed in Surgery	473
“ Out-patients dressings applied	30,583
Night Clinique—16 nights to 31.3.17 :—	
No. of patients attended	627
“ prescriptions for above	853

TABLE X.—Attendances at Evening Clinics to 31st March, 1917.

Clinic 1917.			Syphilis.		Gonorrhoea.		Soft Chancre		Other		Undiagnosed.		Totals.		Grand Totals.
			M.	F.	M.	F.	M.	F.	M.	F.	M.	F.	M.	F.	
1	February 7th	..	1	..	2	..	..	..	6	2	..	..	9	2	11
2	“ 10th	..	1	..	1	3	..	..	3	6	..	..	5	9	14
3	“ 14th	..	1	..	3	2	2	..	5	8	..	..	11	10	21
4	“ 17th	..	1	1	4	3	1	..	3	11	1	..	10	15	25
5	“ 21st	..	..	..	5	3	3	..	8	15	1	..	17	18	35
6	“ 24th	..	3	1	2	3	1	..	5	9	..	..	11	13	24
7	“ 28th	..	2	..	3	3	3	..	10	12	..	..	18	15	33
8	March 3rd	..	1	1	3	2	2	..	5	11	..	..	11	14	25
9	“ 7th	..	3	3	2	2	..	..	18	23	..	..	23	28	51
10	“ 10th	..	3	..	6	3	1	..	5	13	..	..	15	16	31
11	“ 14th	..	5	2	5	1	1	..	12	37	..	..	23	40	63
12	“ 17th	..	3	..	9	1	3	..	13	13	..	..	28	14	42
13	“ 21st	..	6	1	5	3	2	..	20	36	..	..	33	40	73
14	“ 24th	..	1	..	10	2	3	1	9	25	..	..	23	28	51
15	“ 28th	..	2	4	5	4	1	..	15	59	..	..	23	67	90
16	“ 31st	..	2	..	9	2	..	2	6	17	..	..	17	21	38
			35	13	74	37	23	3	143	297	2	..	277	350	627

TABLE XI.

Number of Syphilis cases admitted to new ward	13
Number of “Salvarsan” injections given in ward	33
No. of Wasserman tests done in connection with Hospital	69
No. of positive Wasserman tests before treatment	36
No. of negative Wasserman tests before treatment	33
No. of negative Wasserman tests after treatment	6
Admitted to new ward with Gonorrhoea and soft chancre	82
No. of above discharged cured	51
Refused to remain in Hospital until cured	17
No. of Syphilis cases attending O.P. Department	12
No. of Gonorrhoea cases attending O.P. Department	45

INSTRUCTIONS TO THOSE HAVING SYPHILIS.

Your disease is not only a skin disease, it is a disease of the whole body which may greatly injure the heart, liver, bones, brain and nerves. It is a very serious disease, often leading to injury or destruction of important parts, such as the eyes, or to such injury of the blood vessels and heart which may result in sudden death or to such damage to the spinal cord and brain as to cause paralysis and insanity. In women it causes miscarriage and sterility.

But it can be cured if you are willing to continue the proper treatment long enough and will follow your physician's directions. The earlier you place yourself under proper treatment the more likely will be your cure.

When your present trouble is over you may think your disease has been cured and you may then neglect further treatment. The object of this card is to warn you against this mistaken idea. The disease may be present "in the blood" without showing any outward signs and may strike you down even after twenty years of apparent good health. Your physician will tell you when you may stop treatment. You must report to him for treatment or for blood tests for several years; but *do not think you are cured because you feel well and do not see anything wrong with yourself.*

The disease is infective and unless you are very careful you may give it to some one in your family or to friends. Do not marry until your physician gives you permission to do so. You may infect not only your wife, but you may transmit the disease to your children.

1. Always sleep alone so that you may not infect anyone else.
2. Always use separate towels, washcloth, brushes, comb, razors, soap sponge, etc., and never let anyone else use yours otherwise they may infect some one else.
3. Never permit anyone to use anything which has been in your mouth, such as tooth brushes, tooth picks, pipes, cigars, cigarette, pencils, spoons, forks, cups.
4. Brush your teeth several times a day at any rate after each meal.
5. If you have to see a dentist, tell him about your disease before he examines your teeth.
6. Do not kiss anyone, for if you have sores on your lips you may infect the person you kiss.
7. Do not have sexual intercourse during the first year nor thereafter until you have permission from your physician.
8. Always burn dressings or bits of lint or cotton that have been on a sore.
9. Do not smoke or chew tobacco. Do not take any alcoholic drinks, such as beer, gin, whisky, brandy, etc.
10. Avoid all spicy foods and drinks, such as mustard, etc.
11. Always tell your physician whom you may hereafter consult for any illness that you have had this disease.
12. Avoid quacks and drug store and self-medication
13. Don't bathe in a bath or tub that is used by anyone else and never use a bath or tub that is used for other purposes than for bathing.

ISSUED BY THE CENTRAL BOARD OF HEALTH, JAMAICA.

INSTRUCTIONS TO THOSE HAVING GONORRHEA OR CLAP.

You have a serious infective disease, which, however, yields to treatment. If treatment is neglected it may continue for years after the discharge ceases although you think that you are quite well. During this period, although the visible discharge has ceased, it is possible for you to give this disease to others, therefore, you must not marry or have any sexual relations until a reputable physician has pronounced you cured. It is a very grave disease in women. As a result of it they may never have children or may be made invalids for life or be compelled to undergo very serious operations. A child born to a woman with this disease may become blind. Clap is never the result of a strain.

For your own protection and the protection of others observe the following rules:

1. Always wash your hands after handling the parts; the discharge, if carried to the eyes, may make you blind.
2. Sleep alone and be sure that no one uses your toilet articles, particularly your towel, and wash cloth, sponges, etc., so as not to infect anyone else.
3. Never lend your syringe to anyone, and as soon as you are well destroy it.
4. Avoid all sexual relations and excitement until pronounced cured and do not think that you are cured because the visible discharge has ceased. You may still be able to infect others although the discharge has ceased.
5. Be sure that your bowels move every day. If they do not take a laxative.
6. Live moderately. Take plain food.
7. Do not use alcohol in any form, as it always prolongs the disease. Take no Rum, Beer or Spirits.
8. Drink from six to eight glasses of water or barley water a day, but not late in the evening.
9. Avoid all spicy or peppery foods and drinks, such as ginger ale, mustard, pepper and horse-radish. Drink no tea nor coffee.
10. As long as there is much discharge, walk as little as possible; walking keeps up the discharge and may cause Bubo.
11. Be sure to continue treatment until pronounced cured. Avoid advertising doctors and drug store or self-medication or obeahmen.
12. Burn all soiled rags and dressings for any one else who touches them may become infected.

ISSUED BY THE CENTRAL BOARD OF HEALTH.

VICTORIA JUBILEE LYING-IN HOSPITAL.

Report for the year ended 31st March, 1917.

Kingston, March 31st, 1917

SIR,

I have the honour to submit the report of the Victoria Jubilee Lying-in Hospital for the year ended 31st March, 1917.

The number of patients admitted during the year was 594 against 517 of the previous year. 407 of the patients were black, 175 coloured, 9 white, 3 coolies, 217 were married.

477 patients came from Kingston, 96 St. Andrew, 4 Port Royal, 17 from more remote parishes.

There were 9 deaths during the year, 5 from puerperal convulsions, 1 accidental hæmorrhage, 1 malaria, 1 rupture of uterus, 1 from syncope following protracted childbirth. 132 had albuminuria on admission.

The number of infants born was 495, of these 207 were males, 228 females. There were eight cases of twins. 32 infants were still born, 21 of this number had not reached full term and were macerated. 27 infants died, 21 of these were premature births, 15 of these had to be resuscitated and only lived from one to three hours after birth.

With the inauguration of the Creche and "Child Saving League" we hope to be able to send in better reports in future in that expectant Mothers will be given very necessary advice by competent nurses employed by the League, and by following this advice and taking more care of themselves we trust that the percentage of still births will be much decreased. It is now most certainly up to these women to take advantage of the opportunities offered to them to profit thereby.

Our nurses are once more indebted to Dr. and Mrs. Ker for their annual Xmas dinner; their kindness and generosity to the nursing staff is never failing. This year Dr. Ker gave £2 towards the dinner because he said the prices of the foodstuffs had gone up. Mrs. Ker contributed with sweets, crackers, fruit, etc. Both Dr. and Mrs. Ker helped on Xmas Day, and the staff are always pleased to see them and extend them a hearty welcome.

On New Year's day the nurses had a ham given them by the Medical Officer Mr. and Mrs. Vincent Townsend, Cedar Valley, again sent a fine turkey weighing 20 lbs. it was a most delicious bird. Mrs. V. Townsend also sent a bundle of baby clothing which is at all times most welcome. During the summer a large number of mangoes were sent down from King's House for the patients and nurses.

10 pupil nurses were admitted for training and passed their examination and were awarded certificates, one was dismissed for incompetency.

It is very gratifying to note in this Annual Report that although two cases were admitted suffering from breast abscesses not a single case occurred among the patients while in hospital this speaks for itself, and volumes for the nursing staff and supervision.

During the Matron's absence on leave (4 months) Nurse McNeil Smith, head nurse, acted and carried out the duties in a most efficient manner.

I have, etc.,

(Sgd.)

M. GRABHAM,

Visiting Medical Officer, Victoria Jubilee Hospital.

The Superintending Medical Officer,
Kingston.

SYNOPSIS OF CASES.

<i>Presentations—</i>				Cellulitis ..	I
Vertex ..	..	468		Colitis ..	2
Unreduced Occipito posterior	..	8		Contracted Pelvis ..	4
Footling ..	..	22		Constriction of vagina ..	I
Transverse ..	..	4		Dysentery ..	I
Face ..	..	I		Trotsky ..	I
<i>Operations—</i>				Fever, ephemeral ..	15
Version ..	..	II		Fever, Malaria ..	3
Application of forceps ..	..	14		Gonorrhoea ..	4
Curetting ..	..	53		Heart Disease ..	I
For ruptured perinaeum ..	..	36		Hydramnios ..	3
For imperforate anus ..	..	2		Hypertrophy of cervix ..	I
For retained Placenta ..	..	9		Hæmorrhage Post posterior ..	7
For abscess of throat ..	..	I		Hæmorrhage concealed accidental	I
For internal Accidental hæmorrhage	..	I		Hæmorrhage Antipartem ..	II
For Face Presentation ..	..	I		Hæmorrhage from vulva ..	I
For vaginal abscess ..	..	2		Hæmorrhage secondary ..	I
<i>Diseases and deformities affecting the Infant—</i>				Hæmaturia ..	I
Ascites Belly ..	..	I		Hour glass contraction ..	I
Club foot ..	..	I		Inertia uterine ..	6
Convulsions ..	..	5		Knotted cord ..	I
Deformed hands and feet ..	..	2		Miscarriage ..	8
Extra fingers ..	..	6		Placenta Praevia ..	2
Extra Toes ..	..	2		Puerperal convulsions ..	14
Hæmorrhage Diathesis ..	..	4		Prolapse of cord ..	4
Imperforate anus ..	..	2		Puerperal mania ..	2
Ophthalmia ..	..	14		Precipitate Labour ..	I
<i>Diseases and complications affecting the Mother—</i>				Prolonged Labour ..	I
Abscess vaginal ..	..	2		Pneumonia ..	I
Abscess throat ..	..	I		Ricketts ..	I
Abscess breast ..	..	2		Tonic contraction of uterus ..	I
Adherent Placenta ..	..	9		Rigid Os ..	2
Albuminuria ..	..	132		Unrotated shoulders ..	4
				Ulcers on legs ..	2
				Ulcers on labia ..	2
				Uterine tumours ..	6
				Purulent discharge ..	4
				Vulva, tumours, of ..	I
				Born before arrival on way to Hospital	3
				(two living infants, one dead).	

Financial Return of the Victoria Jubilee Lying-in Hospital for the six years ended 31st March, 1912, 1913, 1914, 1915, 1916 and 1917.

Year.	Average daily No. of beds occupied.	Gross Expenditure.	Receipts.	Net expenditure after deducting receipts.	No. of patients admitted.	Average annual cost per occupied bed calculated on the gross expenditure.	Cost of maintenance alone per occupied bed per diem.	Daily cost per occupied bed calculated on the gross expenditure.	Average annual cost per occupied bed calculated on the net expenditure.	Average daily cost per occupied bed calculated on the net expenditure.
		£ s. d.	£ s. d.	£ s. d.		£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.
1911-12 ...	32	1,355 5 4	392 11 6	962 13 10	746	42 7 0½	0 0 10	0 2 3¾	30 1 8	0 1 7¾
1912-13 ...	30	1,430 12 9	366 8 6	1,064 4 3	653	47 13 9	0 0 11	0 2 7¼	35 9 5¾	0 1 11¼
1913-14 ...	27	1,245 4 3	573 16 4	671 7 11	634	46 2 4½	0 0 9¾	0 2 6¼	24 17 4	0 1 4½
1914-15 ...	28	1,243 19 1	545 6 1	698 13 0	651	44 8 6½	0 0 8¾	0 2 5	24 19 0½	0 1 4½
1915-16*	23	1,199 12 10	465 2 6	734 10 4	517	52 3 2	0 0 10	0 2 10	31 18 8½	0 1 9
1916-17 ...	25	1,218 5 6	577 15 0	640 10 6	594	48 14 7	0 0 9¾	0 2 10	25 12 5	0 1 5

* Includes Patients ... 14
do. Pupil Nurses ... 9
do. Charge Nurses ... 1
do. Head Nurse ... 1

Numerical Summary of results since the opening of the Institution.

Year.	No. of Patients.	Race.				Infants.				Deaths.	No. of Nurses trained.
		Black.	Coloured.	Coolies.	White.	Male.	Female.	Twins.	Still-born.		
1892-93	89	67	22	..	..	20	34	..	14	4	4
1893-94	219	171	44	3	1	74	85	1	35	9	11
1894-95	239	185	48	2	4	76	96	6	27	3	6
1895-96	217	187	26	1	3	89	86	3	40	1	5
1896-97	378	281	92	4	1	173	189	6	39	7	8
1897-98	444	319	120	3	2	229	210	12	36	10	6
1898-99	500	345	146	4	5	249	253	13	60	7	10
1899-1900	581	382	196	2	1	277	283	11	66	9	9
1900-1901	483	339	135	5	4	241	227	6	38	9	9
1901-1902	785	589	235	7	4	379	374	10	58	7	8
1902-1903	651	429	219	2	1	332	325	19	51	11	12
1903-1904	813	596	205	3	9	394	405	21	78	11	9
1904-1905	655	475	174	2	4	339	307	20	62	8	11
1905-1906	415	248	156	4	7	198	214	8	36	10	9
1906-1907	441	352	79	3	7	221	215	15	29	11	6
1907-1908	434	270	161	3	-	243	155	14	40	7	8
1908-1909	596	400	188	3	5	300	268	7	49	10	6
1909-1910	650	380	265	4	1	330	319	10	53	9	7
1910-1911	600	382	212	3	3	288	316	15	60	5	7
1911-1912	746	481	155	5	5	345	364	16	71	8	7
1912-1913	653	446	195	8	4	350	291	18	52	9	7
1913-1914	634	417	209	3	5	288	296	13	46	8	10
1914-1915	651	433	210	4	4	292	284	9	41	15	7
1915-1916	517	343	158	9	7	259	219	12	36	7	7
1916-1917	594	407	175	3	9	267	228	8	32	9	10

LUNATIC ASYLUM.

Report for the year ended 31st March, 1917.

Report for the year ended 31st March, 1917.

Lunatic Asylum,

Sir,

I have the honour to submit the Annual Report of the Jamaica Lunatic Asylum for the year ended 31st March, 1917.

2. The following Population Return of the Asylum shews the numerical changes for the twelve months. It will be observed that the number of inmates has diminished by 119, from 1,441 to 1,322. This diminution of our population is due to three factors, viz., fewer admissions, higher rate of recovery and higher death rate.

	Males.	Females.	Total.	Males	Females.	Total.
Remaining 31st March, 1916	741	700	1,441			
Admitted during 1916-17	155	130	285			
Born during 1916-17	..	1	1			
Captured during 1916-17	3	..	3			
Total under care 1916-17	..	..	..	899	831	1,730
Discharged—						
Recovered	102	62	164			
Relieved	1	1	2			
Not improved	2	..	2			
Escaped	4	..	4			
Infants discharged	..	2	2			
Patients died	133	101	234	242	166	408
Remaining 31st March, 1917	..	..	..	657	665	1,322

3. The total number of patients under treatment was 1,730 with an average number of 1,391.

4. The total number of admissions were 286 or 47 fewer than the admissions for the previous 12 months. A large proportion of the patients admitted suffered from bad health and many died within a short time of their admission. Several aged demented and harmless imbeciles who could obtain better attention elsewhere were refused admission. There may be cogent reasons for transferring harmless demented from the almshouses to the Asylum, but it would be well if the Parochial Authorities realized the Asylum is an Institution for the treatment of the insane and not a home of refuge for the destitute.

5. The total number of patients discharged was 174, or an increase of 30 upon the previous 12 months.

Of those discharged 164 recovered, 2 were relieved, 2 not improved and 4 escaped, 3 of whom were captured and readmitted. The rate of recovery calculated on the rate of admission was 57.3 per cent. which with one exception is the highest in the history of the Institution.

6. The total number of deaths amounted to 234, of which 133 were males and 101 females. The death-rate of 16.8 per cent is the highest recorded in the Institution for some years. This high mortality may be attributed to the cold weather with a sudden fall of temperature at night during the last six months of the year. It proved particularly fatal to many old people who had spent many years of their lives in the Asylum. Four of them were inmates for 53, 43, 40 and 39 years respectively. One female patient occupying an associated dormitory, died from injuries inflicted by another inmate who suddenly developed delusions of persecution, and with the intention of defending herself, attacked the occupant of the next bed.

7. The general health of the Institution as indicated by the high death rate was not satisfactory. In common with Kingston, thoracic diseases, including pneumonia; were prevalent during the colder months, and several cases ended fatally.

During the autumn months a large number of the male patients suffered from amoebic dysentery. All cases were promptly isolated and treated with Emetine and large doses of Bismuth with very satisfactory results; the majority of cases improved rapidly under this form of treatment, but many were left very weak and subsequently died from Cardiac failure.

There was a slight outbreak of measles in the Spring. All the cases were isolated and recovered under treatment.

Pellagra was very prevalent, and it is interesting to note that several cases were admitted suffering from the disease, which shews it is by no means confined to the Lunatic Asylum and Manning's Home for children.

Opinions still differ as to the cause or causes of Pellagra. Experiments carried out in the United States shew there may be some relation between sanitation and the disease, as improvements in sanitation seem to prevent the non-pellagrin part of the population from contracting the disease, tho' it does not affect the disease in those already suffering.

Some believe the cause of the disease is to be found in nutritional deficiency, though adverse conditions, such as poverty and bad hygienic conditions, play a part. In this connection it is pointed out that when poverty was rife in France in the time of Napoleon I, pellagra flourished, whilst later when France became prosperous, pellagra gradually disappeared. Let us hope that Jamaica with intensive cultivation will shew similar improvements.

8. The buildings have been kept in proper state of repair by the Public Works Department. The hurricane of August 15th caused very little damage to the buildings, but a large number of trees on the grounds were uprooted and destroyed.

9. Employment was provided for those who could be induced to work. The male patients were employed on the grounds and in the workshops, whilst the female patients were employed in the laundry and sewing rooms.

10. With the assistance of many kind friends, indoor and outdoor recreations were provided for the inmates; walking and bathing parties outside the airing courts were taken daily.

Religious services were provided on Sundays, Good Friday and Christmas Day.

Mrs. H. C. Bourne visited the wards of the female division on Xmas Day, attended dinner and spoke words of comfort to the inmates.

11. We have again to gratefully acknowledge the receipt of periodicals and illustrated papers for the wards from the following.

Mrs. Aston Gardner, John MacDonald, Esq., R. S. Haughton, Esq., L. J. Stone, Esq., H. A. Hamilton, Esq., T. F. Clarke, Esq., The Jamaica Club, St. Andrew Club and the Jamaica Institute.

12. It is with regret we have to record the death of Capt. W. Peploe Forwood, J.P., who for a quarter of a century, was a faithful member of the Board of Visitors; he took keen interest in the welfare of the Institution and its inmates.

We have also to record the death of ex-attendant Edward Simpson who served his country as Sgt. Major of the 1st W. I. Regiment for 21 years and the Asylum as Charge attendant for 23 years, before ill-health and advancing years compelled him to resign and enjoy a well-earned pension.

13. Mr. R. R. Wynter, Second Class Clerk, on promotion to the First Class grade, was transferred to the office of the Inspector General, Police Department, and Mr. R. Hutton transferred from the Treasury to fill the vacancy in the Asylum office.

Mr. Geo. W. Taylor owing to ill-health was granted three month's leave of absence.

Dr. T. F. Shackleton, Senior Assistant Medical Officer continues on active service with the Royal Army Medical Corps.

14. The sum voted for the maintenance of the Asylum, including a Special Warrant for £820, was £25,004 15s. 7d.; the sum expended was £23,787 12s. 4d. or a rate per head per annum of £17 2s. 0½d.

I have the honour to be,

Sir,

Your obedient servant,

D. J. WILLIAMS, Medical Superintendent.

The Asylum, 7th July, 1917.

The Suptg. Medical Officer,
Kingston.

TABLE I. Shewing the actual admissions, re-admissions, discharges and deaths during the year ended 31st March, 1917.

	Males.	Females.	Total.	Males.	Females.	Total.
In Asylum 1st April, 1916	..	..	..	741	700	1,441
Cases admitted—						
First admissions	.. 119	102	221			
Not first admissions	.. 36	28	64			
Captured	.. 3	..	3			
Birth	.. ..	1	1			
Total cases admitted during the year	..	..	..	158	131	289
Total cases under care during the year	..	..	..	899	831	1,730
Cases discharged—						
Recovered	.. 102	62	164			
Relieved	.. 1	1	2			
Not improved	.. 2	..	2			
Escaped	.. 4	..	4			
Died	.. 133	101	234			
Infant removed	.. ..	2	2			
Total discharged and died during the year	..	..	..	242	166	408
Remaining in Asylum 31st March, 1917	..	..	..	657	665	1,322
Average number resident during the year	..	..	..	694	697	1,391
Persons under care during the year (<i>i.e.</i> , separate persons in contradistinction to cases which may include the same individual more than once)				886	835	1,711
Persons admitted including 1 infant born in Asylum	do	do	do	152	129	281
Persons recovered	do	do	do	97	60	157

TABLE Ia.—Shewing the number of previous attacks among those admitted during the year, 1916-1917, distinguishing those attacks that have been treated to recovery and discharged.

Number of previous attacks.	.Having had previous attacks.					
	All attacks. .			Attacks followed by discharge or recovery.		
	Males.	Females.	Total.	Males.	Females.	Total.
Have had 1 previous attack	27	22	49	5	2	7
Have had 2 previous attacks	13	7	20	4	1	5
Have had 3 previous attacks	1	..	1	..	..	..
Have had 4 previous attacks	1	4	5	1	1	2
Have had more than 5 attacks .. ..	..	2	2	..	..	..
	42	35	77	10	4	14

TABLE II.—Shewing the admissions, re-admissions, discharges and deaths for the past twenty years ended 31st March, 1917.

	Males.	Females.	Total.	Males	Females.	Total.
Remaining on 31st March, 1897 .. ..	..	..	..	345	377	722
Admitted during the last twenty years ..	2,186	2,088	4,274			
Re-admissions	430	359	789			
Infant born in 1916-1917 .. ..	..	1	1			
Total number of admissions .. ..	..	..	..	2,616	2,448	5,064
Total number under care .. ..	..	..	..	2,961	2,825	5,786
Discharged cases—						
Recovered	1,186	1,089	2,275			
Relieved	37	21	58			
Not improved	30	12	42			
Died	1,047	1,036	2,083			
Escaped and not captured	4	..	4			
Infants discharged .. ..	..	2	2			
Total discharged and died .. ..	..	..	..	2,304	2,160	4,464
Remaining 31st March, 1917 .. ..	..	..	..	657	665	1,322
Average yearly number resident .. ..	..	..	..	528	538	1,066

TABLE III.—Shewing the Admissions, Discharges and Deaths, with the mean Annual Mortality, and the proportion of recoveries per cent. of the Admissions for each of the last twenty years.

Year.	Admitted			Discharged.												Remained 31st March in each year			Average number Resident.			Percentage of Recoveries. on admission.			Percentage of Deaths on average number Resident.			
				Recovered						Relieved.		Not Improved.		Died.														
				M.	F.	T.	M.	F.	T.	M.	F.	M.	F.	T.	M.													F.
	M.	F.	T.	M.	F.	T.	M.	F.	T.	M.	F.	T.	M.	F.	T.	M.	F.	T.										
1897-98	109	95	204	34	34	68	..	..	2	..	2	25	44	69	393	394	787	377	382	759	31.19	36.84	34.01	6.63	11.16	8.89
1898-99	88	80	168	66	53	119	..	..	2	2	4	32	31	63	381	386	767	386	388	774	75.	66.25	70.62	8.29	7.98	8.13
1899-1900	96	83	189	34	32	66	1	..	1	2	4	38	30	68	402	417	819	390	399	789	35.41	34.41	34.90	9.74	7.52	8.63		
1900-01	104	96	200	48	42	90	2	..	2	..	..	32	27	59	424	444	868	414	430	844	46.15	43.75	44.95	7.72	6.27	6.99
1901-02	99	83	182	55	48	103	3	1	4	2	..	40	38	78	423	440	863	423	439	862	55.55	57.83	56.69	9.45	8.65	9.05		
1902-03	118	108	226	41	35	76	..	..	..	..	..	25	29	54	475	484	959	456	459	915	43.74	32.40	33.57	5.48	6.31	5.89
1903-04	105	101	206	34	33	67	..	..	..	3	..	38	57	95	505	495	1,000	492	480	972	32.38	32.67	32.52	7.72	11.87	9.79
1904-05	124	116	240	53	37	90	..	1	1	3	1	37	74	111	536	498	1,034	520	502	1,022	42.74	31.89	37.31	7.11	14.74	10.92		
1905-06	134	96	230	52	53	105	11	4	15	1	..	44	42	86	562	495	1,057	545	503	1,048	38.80	55.20	47.	8.07	8.34	8.20		
1906-07	109	125	234	83	68	151	8	5	13	..	..	76	45	121	504	502	1,006	543	505	1,048	76.14	54.40	55.27	13.99	8.91	11.45
1907-08	148	131	279	58	61	119	3	3	6	..	1	72	55	127	519	513	1,032	520	513	1,033	39.18	46.56	42.87	13.84	10.72	12.28		
1908-09	114	123	237	51	34	85	4	2	6	1	2	81	39	120	496	559	1,055	515	535	1,050	44.73	27.64	36.18	15.72	7.28	11.50		
1909-10	139	123	262	46	51	97	1	1	2	2	1	60	73	133	525	556	1,081	510	571	1,081	33.09	41.46	37.27	11.76	12.78	12.27		
1910-11	164	160	324	71	72	143	1	..	1	1	..	49	42	91	567	602	1,169	546	591	1,137	43.29	45.	44.14	8.97	7.10	8.03		
1911-12	138	130	268	67	77	144	3	2	5	1	..	40	51	91	593	602	1,195	581	602	1,183	48.55	59.23	53.89	6.88	8.47	7.67		
1912-13	160	189	349	73	61	134	..	..	..	1	..	45	50	95	634	680	1,314	625	647	1,272	45.62	32.27	38.94	7.2	7.72	7.46
1913-14	162	156	318	69	89	158	1	..	1	1	..	77	53	130	647	694	1,341	637	686	1,323	42.59	57.05	49.82	12.08	7.72	9.90		
1914-15	158	171	329	69	87	156	2	..	2	1	2	41	69	110	692	707	1,399	670	716	1,386	43.67	50.87	47.27	6.11	9.63	7.87		
1915-16	192	140	332	80	60	140	..	1	1	1	1	62	86	148	741	700	1,441	715	712	1,427	41.66	42.85	47.25	8.67	12.07	10.37		
1916-17	155	130	285	102	62	164	1	1	2	2	..	133	101	234	657	665	1,322	694	697	1,391	65.80	47.69	57.79	19.16	14.49	16.82		
Totals Average for 20 years	2,616	2,446	5,062	1,186	1,089	2,275	41	21	62	26	12	38	1,047	1,036	2,083	10,676	10,833	21,509	10,559	10,757	21,316	925.28	896.26	911.56	194.59	189.73	192.15	
	533.8	541	651	1095.45	527.95	537.85	1065.8	46.26	44.81	45.57	9.73	9.49	9.61

TABLE IV.—Shewing the history of the annual admissions for the past twenty years, with the discharges and deaths, and the numbers of each year remaining on 31st March, 1917.

Year.	Admitted.						Of each year's admissions, discharged and died in the year.												Total discharged and died of each year's admissions to 31st March, 1917.												Remaining of each year's Admissions 31st March, 1917.			Year.																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																			
	New Cases.			Re-admissions.			Recovered.			Relieved.			Not improved.			Died.			Recovered.			Relieved.			Not improved.			Died.			M.	F.	T.																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																				
	M.	F.	T.	M.	F.	T.	M.	F.	T.	M.	F.	T.	M.	F.	T.	M.	F.	T.	M.	F.	T.	M.	F.	T.	M.	F.	T.	M.	F.	T.																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																							
1897-98	91	82	18	13	204

Summary of total admissions.

Percentage of cases recovered

do. relieved

do. not improved

do. died

do. remaining

Summary of total admissions.

Percentage of cases recovered

do. relieved

do. not improved

do. died

do. remaining

Summary of total admissions.

Percentage of cases recovered

do. relieved

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Summary of total admissions.

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Percentage of cases recovered

do. relieved

do. not improved

do. died

do. remaining

Summary of total admissions.

Percentage of cases recovered

do. relieved

do. not improved

do. died

do. remaining

Summary of total admissions.

TABLE V.—Shewing the causes of Death during the year 1916-1917, with the ages at death.

	Under 15		15 & Under 20		20 & Under 25		25 & Under 30		30 & Under 35		35 & Under 40		40 & Under 45		45 & Under 50		50 & Under 55		55 & Under 60		60 & Under 65		65 & Under 70		70 & Under 75		75 & Under 80		80 & Under 85		Over 85		Total.		Grand Total	
	M.	F.	M.	F.	M.	F.	M.	F.	M.	F.	M.	F.	M.	F.	M.	F.	M.	F.	M.	F.	M.	F.	M.	F.	M.	F.	M.	F.	M.	F.	M.	F.	M.	F.		
Cerebro Spinal Diseases—																																				
Chronic Brain disease	1	2	2	2	2	2	6	..	..	9	5	2	1	5	2	2	1	4	..	..	..	4	..	3	..	..	19	34	53	..	..
Abscess of Brain	
Cerebral Haemorrhage	1	..	..	..	..	..	..	1	2	..	..	..	1	..	..	..	..	..	..	..	..	..	..	..	3	3	6	..	..
Cerebral Softening	1	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	1	1	..	..
Maniacal Exhaustion	1	1	2	..	2	..	2	..	2	1	1	2	..	..	..	..	..	..	1	..	..	..	..	..	..	..	..	7	9	16	..	..
Epilepsy	
Senile Decay	3	7	10	..	..
Thoracic Diseases—	
Phthisis	3	..	1	1	4	2	..	1	2	1	..	1	3	..	1	..	..	..	2	..	..	..	..	1	..	..	17	6	23	..	..
Morbus Cordis	2	..	..	..	..	..	..	..	1	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	3	..	3	..	..
Pneumonia	1	..	2	1	1	..	1	..	..	..	4	..	..	1	..	..	..	..	..	..	..	..	..	..	..	..	..	10	..	10	..	..
Chronic Pleurisy	2	..	..	..	..	..	..	1	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	3	..	3	..	..
Abscess of Lung	2	1	1	1	2	1	..	4	1	..	..	..	..	1	..	1	..	1	..	..	..	..	..	..	..	5	9	14	..	..
Pleurisy	1	..	1	..	..
Heart Failure	1	..	..	3	..	1	..	2	..	..	..	1	1	..	..	..	..	..	..	..	..	..	..	..	..	9	9	..	..
Chronic Pericarditis	1	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	1	1	1	..	..
Anconysm of Pul. Art.	1	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	1	1	1	..	..
Ordema of Lungs	1	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	1	..	1	..	..
Empyema	1	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	1	..	1	..	..
Abdominal Diseases—	1	..	..	..	..	..	..	1	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	5	5	5	..	
Bright's Disease	1	..	..	..	..	..	..	..	..	1	..	1	..	1	..	..	..	..	..	..	..	..	..	..	..	..	..	..	22	7	29	..	..
Dysentery	2	1	4	1	4	1	1	2	5	..	3	..	1	1	1	1	..	..	..	..	1	..	..	..	..	..	..	..	..	..	..
Tubercular Kidneys	
Abscess of Kidneys	1	..	..	..	..	..	..	..	..	..	1	..	..	..	..	..	..	1	..	..	..	..	..	..	3	..	3	..	..	..
Acute Nephritis	
Ulcerative Colitis	
Tubercular Peritonitis	1	..	..	..	..	..	..	..	..	..	..	..	..	1	..	..	..	..	..	..	..	..	..	..	..	..	..	1	1	1	2	..	2	

TABLE VI.—Shewing the length of residence in those discharged recovered and in those who have died during the year, 1916-17.

Length of Residence.	Recovered.			Died.		
	Males.	Females.	Total.	Males.	Females.	Total.
Under 1 month	1	1	2	7	9	16
From 1 to 3 months	11	3	14	8	9	17
From 3 to 6 months	30	19	49	10	5	15
From 6 to 9 “	17	11	28	5	6	11
From 9 to 12 “	15	12	27	6	2	8
From 1 to 2 years	14	9	23	20	8	28
From 2 to 3 “	4	4	8	13	7	20
From 3 to 5 “	3	..	3	16	12	28
From 5 to 7 “ .. ..	..	3	3	13	7	20
From 7 to 10 “	2	..	2	7	8	15
From 10 to 12 “	5	..	5	2	3	5
From 12 to 15 “ .. ..	..	..	..	5	4	9
From 15 to 20 “ .. ..	..	..	..	6	10	16
From 20 to 25 “ .. ..	..	..	..	6	3	9
From 25 to 30 “ .. ..	..	..	..	2	6	8
From 30 to 35 “ .. ..	..	..	..	1	1	2
From 35 to 40 “ .. ..	..	..	..	4	..	4
Upwards of 40 “ .. ..	..	..	..	2	1	3
	102	62	164	133	101	234

TABLE VII.—Showing the duration of the disorder on admission in the admissions, discharges and deaths during the year ended 31st March, 1917.

CLASS.	Admissions.			Discharges.						Deaths.		
				Recovered.			Removed, Relieved or otherwise.					
	M.	F.	T.	M.	F.	T.	M.	F.	T.	M.	F.	T.
<i>First Class</i> —First attack, and within 3 months on admission ..	83	78	161	60	44	104	..	1	1	49	47	96
<i>Second Class</i> —First attack, above 3 and within 12 months on admission ..	16	9	25	18	2	20	..	..	..	28	14	42
<i>Third Class</i> —Not first attack, and within 12 months on admission ..	40	31	71	24	15	39	3	..	3	42	12	54
<i>Fourth Class</i> —First attack or not, but of more than 12 months on admission ..	12	5	17	..	1	1	..	..	..	10	9	19
<i>Fifth Class</i> —Congenital ..	1	..	1	..	..	..	..	..	..	..	..	..
Unknown ..	3	7	10	..	..	..	..	..	..	4	19	23
Total ..	155	130	285	102	62	164	3	1	4	133	101	234

TABLE VIII.—Shewing in quinquennial periods the ages of those admitted, recovered and died during the year 1916-17 and those remaining on 31st March, 1917.

Ages.	Admissions.			Recoveries.			Deaths.			Patients Resident 31st March, 1917.		
	M.	F.	T.	M.	F.	T.	M.	F.	T.	M.	F.	T.
From 5 to 10 yrs.	..	..	..	..	..	..	..	..	..	..	..	..
“ 10 to 15 “	1	1	2	1	1	2	..	..	..	..	1	1
“ 15 to 20 “	14	16	30	15	17	32	5	6	11	13	23	36
“ 20 to 25 “	30	20	50	27	8	35	13	6	19	59	40	99
“ 25 to 30 “	26	22	48	17	9	26	14	13	27	82	57	139
“ 30 to 35 “	22	15	37	14	6	20	20	11	31	96	85	181
“ 35 to 40 “	18	22	40	7	4	11	12	15	27	86	103	189
“ 40 to 45 “	13	8	21	8	5	13	21	11	32	92	101	193
“ 45 to 50 “	14	14	28	7	6	13	20	4	24	75	73	148
“ 50 to 55 “	4	2	6	..	3	3	8	5	13	53	67	120
“ 55 to 60 “	4	3	7	2	..	2	7	8	15	28	43	71
“ 60 to 65 “	2	..	2	..	..	..	4	3	7	39	30	69
“ 65 to 70 “	..	1	1	1	..	1	3	5	8	10	23	33
“ 70 to 75 “	2	..	2	1	1	2	1	8	9	7	8	15
“ 75 to 80 “	..	..	..	..	..	..	2	1	3	8	5	13
“ 80 to 85 “	..	..	..	..	..	..	1	..	1	..	2	2
“ 85 to 90 “	..	..	..	..	..	..	..	2	2	..	..	..
“ 90 to 95 “	..	..	..	..	..	..	..	..	..	..	..	..
Unknown	5	5	10	2	2	4	2	3	5	9	4	13
Infant born	..	1	1	..	..	..	..	..	..	..	..	..
Totals	155	130	285	102	62	164	133	101	234	657	665	1,322
Mean Age	33.7	33.4	33.11	30.73	30.80	30.8	40.3	44.64	42.1	41.36	42.91	42.14

TABLE IX.—Shewing the condition as to Marriage in the Admissions, Recoveries and Deaths during the year ended 31st March, 1917.

Condition in reference to Marriage			Admissions.			Recoveries.			Deaths.		
			M.	F.	T.	M.	F.	T.	M.	F.	T.
Single	..	..	98	83	181	79	42	121	100	61	161
Married	..	..	35	30	65	18	16	34	27	25	52
Widowed	..	..	6	10	16	3	4	7	3	10	13
Unknown	..	..	16	7	23	2	..	2	3	5	8
Divorced	..	..	..	..	..	..	..	..	..	..	..
Total	..	..	155	130	285	102	62	164	133	101	234

TABLE X.—Showing the probable causes of insanity in the patients admitted during the year ended
31st March, 1917.

Cause of Insanity.	Number of instances in which each cause was assigned.											
	Number of cases. Admissions—Males, 155; Females, 130; Total. 285.											
	As pre-disposing cause.			As exciting cause.			As pre-disposing or exciting where these could not be distinguished.			Grand Total.		
	M.	F.	T.	M.	F.	T.	M.	F.	T.	M.	F.	T.
Moral—												
Domestic trouble (including loss of relatives and friends) ..	1	..	1	..	..	..	..	..	..	1	..	1
Adverse circumstances (including business anxieties and pecuniary difficulties) ..	3	..	3	..	..	..	..	..	..	3	..	3
Mental anxiety and worry (not included under above two heads) and overwork	9	9	..	..	..	..	9	9
Religious excitement	4	3	7	..	..	..	4	3	7
Love affairs (including seduction)
Fright and nervous shock
Grief
Earthquake shock
Physical—												
Intemperance in drink	1	..	1	..	..	..	1	..	1
Sexual Intemperance
Venereal Diseases ..	1	..	1	..	..	..	..	..	..	1	..	1
Self-abuse (sexual)
Over-exertion
Ganga-smoking
Accident or injury ..	7	..	7	..	..	..	..	..	..	7	..	7
Puberty
Fevers	7	7	..	..	..	..	7	7
Privation and Starvation
Other bodily disease
Previous attacks ..	28	37	65	..	..	..	..	..	..	28	37	65
Hereditary influence ..	44	43	87	..	..	..	..	..	..	44	43	87
Congenital defect ascertained
Adolescence
Epilepsy ..	7	4	11	..	..	..	..	..	..	7	4	11
Puerperal	2	2	..	..	..	..	..	..	..	2	2
Tubercular disease
Syphilis	2	2	..	..	..	..	..	..	..	2	2
Not known	57	40	97	..	..	..	57	40	97
Other ascertained causes
Childbirth	1	1	..	..	..	..	1	1
Traumatism	4	4	..	..	..	..	4	4
Pellagra	3	3	..	..	..	..	3	3
Organic disease
Yaws	1	1	..	..	..	..	1	1
War Excitement	2	..	2	..	..	..	2	..	2
Senility
Pregnancy	1	1	..	..	..	..	1	1

TABLE XI.—Shewing the form of mental disorder in the Admissions, Recoveries and Deaths during the year and the form of mental disorder of the inmates on 31st March, 1917.

Form of Mental Disorder.	Admissions.			Recoveries.			Deaths.			Remaining in Asylum.		
	M.	F.	T.	M.	F.	T.	M.	F.	T.	M.	F.	T.
Congenital or Infantile mental deficiency—												
(a) with Epilepsy .. ..	..	..	..	..	..	..	..	..	..	..	..	..
(b) without Epilepsy .. ..	..	..	..	..	..	..	..	2	2	..	..	..
Epilepsy—Acquired	10	4	14	1	..	1	14	8	22	53	38	91
General Paralysis of the Insane ..	2	..	2	..	..	..	..	..	..	2	..	2
Mania—												
Acute	83	67	150	58	41	99	86	53	139	97	101	198
Chronic	9	22	31	4	2	6	7	14	21	292	226	518
Recurrent	36	26	62	32	14	46	10	5	15	71	29	100
a Potu .. ..	..	..	..	..	..	..	..	..	..	..	..	..
Puerperal .. ..	..	1	1	..	1	1	..	2	2	..	4	4
Senile	1	..	1	..	..	..	5	1	6	11	13	24
Melancholia—												
Acute	9	2	11	5	..	5	2	5	7	2	20	22
Chronic .. ..	..	..	..	..	..	..	..	..	..	5	10	15
Recurrent	1	2	3	..	1	1	1	3	4	..	13	13
Puerperal .. ..	..	..	..	..	..	..	..	..	..	..	..	..
Senile .. ..	..	..	..	..	..	..	..	1	1	..	..	..
Dementia—												
Primary	4	2	6	2	1	3	6	5	11	..	5	5
Secondary .. ..	..	4	4	..	..	..	..	..	..	9	206	215
Senile .. ..	..	..	..	..	2	2	2	2	4	115	..	115
Organic (<i>i.e.</i> , from tumours, coarse brain lesions, etc.) .. ..	..	..	..	..	..	..	..	..	..	..	..	..
	155	130	285	102	62	164	133	101	234	657	665	1,322

TABLE XII.—Shewing the previous occupations of patients admitted during the year, 1916-1917.

Males.

Occupation.	No.	Occupation.	No.
Labourers	75	Mariner	1
Coachmen	3	Waiter	1
Carpenters	8	Cigar Makers	2
Telephonist	1	Tinsmith	1
Hatmaker	1	Constables	2
Not Known	7	Ex Soldiers	2
Vagrants	2	Blacksmith	1
Stallholder	1	Clerks	4
Shopkeepers	5	Shoemakers	5
Cabinetmaker	1	Cultivator	16
Bookkeeper	1	Contractor	1
Agriculturists	6	Cashier	1
Cartman	1		
Gardener	1		155
Tailors	2		
Bricklayers	3		

TABLE XII.—*continued.*
Females.

Occupation.	No.	Occupation.	No.
Labourers	69	Nurses	2
Dressmakers	4	Governess	1
Washerwomen	7	Higglers	3
Not Known	10	Housewives	3
Domestic Servants	19	Typists	2
Cultivators	2	Candyseller	1
Shopkeeper	1		
Butleress	1		
Seamstresses	5		130

TABLE XIII.—Showing the Physical condition of patients admitted in 1916-1917.

	Males	Females.	Total.
In good bodily health and condition	63	6	69
In fair bodily health and condition	62	68	130
In poor, feeble, very feeble, bad and exhausted condition	30	56	86
Total	155	130	285

FINANCIAL STATEMENT.

TABLE XIV.—Cost of maintenance for the year, 1916-1917.

	£	s.	d.
Salaries	2,462	8	2
Wages	4,794	1	7
Religious Services	58	16	0
Provisions	11,093	5	6½
Necessaries	1,116	2	5
Clothing and Bedding	2,188	14	6
Equipment	238	3	9
Furniture	48	12	3
Wine and Spirits	39	18	8
Surgery and Dispensary	524	17	6
Funeral expenses	126	17	0
Removals	39	12	5
Tenants Repairs	143	1	3
Farm and Grounds	50	11	3
Miscellaneous	126	14	11½
Telephones	24	3	0
Scavengery	0	8	0
Lighting	318	1	10
Conveyance of Lunatics	393	2	3
	23,787	12	4

LESS RE-IMBURSEMENTS.

	£	s.	d.
Contributing Patients, &c.	1,098	9	0
Immigration Fund (Law 31 of 1910)	191	18	9¾
Parochial Poor Rates (Law 26 of 1914)	9,959	5	4
Net cost to General Revenue	12,537	19	2¼

TABLE XV.—Law 26 of 1914.

	Law 26 of 1914.			Amount for	Law 26 of 1914.			Amount for
	No. of Patients, 1916-17.				No. of Patients, 1915-16.			
	Males	Fe- males.	Total.		1916-17.	Males	Fe- males.		Total.	1915-16.
Kingston	170	175	345	£ s. d. 699 13 1	165	179	344	£ s. d. 608 7 11
St. Andrew	60	60	120	632 3 6	53	65	118	549 14 4½
St. Thomas	24	40	64	471 2 10	22	39	61	409 13 9
Portland	28	34	62	591 5 10	33	34	67	514 3 4
St. Mary	45	38	83	873 19 0	51	41	92	759 19 2
St. Ann	43	43	86	846 6 9	48	43	91	735 18 11½
Trelawny	20	31	51	424 16 4	18	26	44	369 8 1½
St. James	42	44	86	495 13 0	41	44	85	431 0 0
Hanover	14	26	40	448 8 1	17	24	41	389 18 4
Westmoreland	60	58	118	796 1 9	56	67	123	692 5 0
St. Elizabeth	67	59	126	942 15 2	55	58	113	819 15 10
Manchester	58	46	104	780 19 5	54	42	96	679 2 1
Clarendon	54	43	97	885 8 7	64	46	110	769 18 9
St. Catherine	114	92	206	1,055 8 3	110	101	211	917 15 0
Port Royal	1	..	1	15 3 9	1	..	1	13 4 2
	800	789	1,589	9,959 5 4	788	809	1,597	8,660 4 9½

TABLE XVI.—Statement respecting Minor Funds of the Jamaica Lunatic Asylum to 31st March, 1917.

1.—SERVANTS' FINE FUND.

Balance on 31st March, 1916	£ s. d. 242 11 8¾
Receipts in 1916-17	14 17 1
Expenditure 1916-17	257 8 9¾
Amount at credit 31st March, 1917	21 12 0
	235 16 9¾

2.—PATIENTS' FUND.

Balance on 31st March, 1916	£ s. d. 1,141 7 2¼
Receipts in 1916-17	87 18 9½
Expenditure during 1916-17	1,229 5 11¾
Amount at Credit 31st March, 1917	47 4 7½
	1,182 1 4¼

3.—O'LOUGHLIN'S FUND.

Balance on 31st March, 1916	£ s. d. 451 16 11
Receipts in 1916-17	15 0 0
Expenditure during 1916-17	466 16 11
Amount at credit 31st March, 1917	..
	466 16 11

TABLE NO. XVII.—Shewing the total number of patients under treatment from 1882-83 to 1916-1917; the Total Cost; the Re-imbursements-in-Aid of Expenses incurred by the Government; the sources from which they are derived; and the Cost of Lunatic Asylum to General Revenue.

Years.	Total number of Patients under treatment.	Total Cost.		Contributing Patients, &c.		Immigration Department.		Parochial Poor Rate.		Total Reimbursements-in-Aid.		Net Cost of the Lunatic Asylum to General Revenue.	
		£	s. d.	£	s. d.	£	s. d.	£	s. d.	£	s. d.	£	s. d.
1882-83	512	7,061	16 9½	189	14 5	None.	4,643	8 8	4,833	3 1	2,228	13 8½	
1883-84	505	6,935	14 2½	208	6 2	"	5,203	10 11	5,411	17 1	1,523	17 1½	
1884-85	513	6,871	12 6	252	13 2	"	4,879	16 0	5,132	9 2	1,739	3 4	
1885-86	531	7,027	7 3	376	6 9	"	4,677	15 5	5,054	2 2	1,973	5 1	
1886-87	530	7,067	10 4½	415	15 7	"	4,971	6 3	5,387	1 10	1,680	8 6½	
1887-88	541	7,710	5 6	365	4 7	"	5,587	15 9	5,953	0 4	1,757	5 2	
1888-89	584	8,781	14 0	391	0 6	"	6,677	13 2	7,068	13 8	1,713	0 4	
1889-90 (6 months)	541	4,755	14 0	151	13 5	"	3,796	11 11	3,948	5 4	807	8 8	
1890-91	648	10,093	10 7½	301	10 0	"	8,208	4 11	8,509	14 11	1,583	15 8½	
1891-92	704	11,578	17 2½	471	6 10	"	9,276	3 2¾	9,747	10 0¾	1,831	7 1¾	
1892-93	702	11,453	1 3¾	532	6 0	"	9,369	19 4	9,902	5 4	1,550	15 11¾	
1893-94	729	11,280	18 1	492	16 4	"	9,197	13 9	9,690	10 1	1,590	8 0	
1894-95	741	11,648	15 6½	384	2 8	"	9,457	16 2½	9,841	18 10½	1,806	16 8	
1895-96	795	11,867	3 1¾	418	13 6	"	9,941	19 0	10,360	12 6	1,506	10 7¾	
1896-97	851	12,901	18 4¼	458	15 2	"	10,932	11 0	11,391	6 2	1,510	12 2¼	
1897-98	926	14,061	12 9	532	19 8	"	11,772	1 4	12,305	1 0	1,756	11 9	
1898-99	953	13,651	4 1	359	10 8	"	11,767	0 9	12,126	11 5	1,524	12 8	
1899-1900	956	13,559	10 1	454	9 1	"	11,514	19 3	11,969	8 4	1,590	1 9	
1900-1901	1,019	14,445	3 2½	525	8 5	"	12,333	1 8½	12,858	10 1½	1,586	13 1	
1901-1902	1,050	14,759	17 8	547	3 10½	"	12,468	15 9¼	13,015	19 7¾	1,743	18 0¼	
1902-1903	1,089	15,029	0 6	517	18 1½	"	13,101	14 3½	13,619	12 5	1,409	8 1	
1903-1904	1,165	16,017	7 10	406	6 2	"	13,926	12 3½	14,342	18 5½	1,674	9 4½	
1904-1905	1,240	16,007	2 0	449	9 2	"	13,843	10 0¾	14,292	19 2¾	1,713	6 0¼	
1905-1906	1,264	16,852	9 7½	631	9 11½	"	14,396	14 5	15,028	14 4½	1,823	15 3	
1906-1907	1,308	16,298	17 10	654	4 3½	"	14,246	2 7	14,900	6 10½	1,398	10 11	
1907-1908	1,285	17,078	8 3	474	1 3	"	15,304	11 4½	15,778	12 7¾	1,299	15 7½	
1908-1909	1,269	17,786	8 11	633	5 10½	"	15,828	13 8½	16,461	19 7	1,324	9 4	
1909-1910	1,320	17,453	7 7¾	459	16 1	"	15,934	10 4¼	16,394	6 5¼	1,059	1 2½	
1910-1911	1,409	19,131	15 7	676	7 10	46 15 5¼	16,540	0 3¼	17,263	3 6¼	1,868	12 0¾	
1911-1912	1,439	17,797	1 2	735	0 8	131 11 0¾	15,722	17 11	16,589	9 7¾	1,207	11 6¼	
1912-1913	1,548	18,414	4 1	889	13 3	194 11 9½	8,237	10 8	9,321	15 8½	9,092	8 4½*	
1913-1914	1,634	19,613	14 8¼	917	4 0	185 17 9½	8,837	13 9½	9,940	15 6¾	9,672	19 1½*	
1914-1915	1,670	20,336	18 10	961	17 11	204 15 5¼	8,660	4 9½	9,826	18 1¾	10,510	0 8¼*	
1915-1916	1,733	22,946	9 6	1,130	19 0½	226 1 8½	8,660	4 9½	10,017	5 6½	12,929	3 11½*	
1916-1917	1,730	23,787	12 4	1,098	9 0	191 18 9½	9,959	5 4	11,249	13 1¾	12,537	19 2¼*	
..	..	482,064	5 5¾	18,465	19 5	1,180 12 0½	359,878	10 11¾	379,536	12 5	102,526	16 3¼	

* The increase during these years is due to General Revenue being charged with half of the cost of maintenance of parochial patients, hitherto borne by the parishes concerned.

TABLE No. XVIII.—A Return shewing the General Financial and other Operations of the Lunatic Asylum from the Year 1874-75 to the Year 1916-1917.

Year.	Daily Average Number.	Salaries. and Religious Services.	Wages.	Provisions.	Necessaries.	Clothing, Furniture and Bedding.
		£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.
1874-75	324.43	1,412 2 10	879 15 7 $\frac{1}{2}$	3,037 14 1 $\frac{1}{2}$	139 5 0	487 0 10
1875-76	324.21	1,553 13 10	923 4 10 $\frac{1}{2}$	2,910 11 7 $\frac{1}{4}$	116 13 8 $\frac{3}{4}$	387 12 3
1876-77	342.52	1,660 4 11	868 8 2	2,832 18 11	134 15 11 $\frac{1}{2}$	347 12 11 $\frac{1}{2}$
1877-78	361.57	1,705 3 10	851 7 0 $\frac{1}{2}$	2,959 18 10	161 10 6	379 8 6 $\frac{1}{2}$
1878-79	364.06	1,853 6 4	805 8 10 $\frac{1}{2}$	3,167 9 11 $\frac{1}{2}$	224 0 10	333 12 2
1879-80	381.25	1,782 18 2	888 11 2	3,161 17 4	176 4 2	328 10 9 $\frac{1}{2}$
1880-81	368.48	1,771 16 6	884 1 3	3,272 19 3 $\frac{1}{2}$	218 3 2	289 10 3
1881-82	358.67	1,784 8 0	861 12 11	2,963 9 9	231 5 4	303 14 5
1882-83	364.06	1,829 3 8	922 2 5	3,152 13 8 $\frac{1}{2}$	220 19 7	322 0 6 $\frac{1}{2}$
1883-84	396.05	1,708 12 10	932 15 5 $\frac{1}{2}$	3,203 7 0	174 4 7	372 11 9 $\frac{1}{2}$
1884-85	399.98	1,792 10 10	936 2 3 $\frac{1}{2}$	3,079 11 8	166 7 0	387 4 4
1885-86	382.09	1,843 11 0	923 0 0	3,150 1 10 $\frac{1}{2}$	176 4 4	345 9 6
1886-87	407.58	1,556 16 7	933 13 2	3,416 13 5	216 19 8	421 2 3
1887-88	398.00	1,533 14 7	994 18 7	3,741 6 1 $\frac{1}{2}$	270 19 10	408 6 3
1888-89	438.24	1,783 9 9	1,161 7 10	4,280 19 5	358 0 0	438 3 2
1889-90 (6 mons.)	465.17	943 10 10	579 11 11	2,351 14 0	190 8 7	209 9 6
1890-91	496.16	1,918 8 6	1,268 15 0	5,102 14 2	403 6 6	433 4 11 $\frac{1}{2}$
1891-92	543.93	1,934 9 8	1,462 14 6 $\frac{1}{2}$	6,035 16 4	424 12 8 $\frac{1}{2}$	685 7 9
1892-93	558.57	1,969 0 0	1,461 6 9 $\frac{1}{2}$	5,421 17 7 $\frac{1}{4}$	514 18 2	691 7 8 $\frac{1}{2}$
1893-94	571.98	2,239 1 4	1,509 19 3	5,299 17 4 $\frac{1}{2}$	494 0 1	599 5 11 $\frac{1}{2}$
1894-95	592.72	2,394 17 3	2,259 5 2	4,565 11 10 $\frac{1}{2}$	529 13 7	667 8 10 $\frac{1}{4}$
1895-96	636.78	2,357 1 0	2,328 16 7	4,772 11 10 $\frac{1}{4}$	499 1 6	625 2 5
1896-97	694.15	2,519 17 9	2,410 18 3	5,336 10 2	545 9 2 $\frac{3}{4}$	803 18 8 $\frac{1}{2}$
1897-98	759.70	2,554 1 11	2,838 16 10	5,470 9 11	615 17 4 $\frac{1}{4}$	993 2 4 $\frac{1}{2}$
1898-99	774.96	2,586 1 2	3,175 7 6	5,342 10 9 $\frac{1}{4}$	529 7 0 $\frac{3}{4}$	924 14 4 $\frac{1}{2}$
1899-1900	789.03	2,441 4 10	3,202 3 5	5,367 9 11	581 0 11	977 9 3 $\frac{1}{2}$
1900-1901	844.32	2,564 0 11	3,198 9 11	5,807 12 5 $\frac{1}{2}$	781 1 0 $\frac{1}{2}$	992 2 6 $\frac{1}{2}$
1901-1902	862.68	2,438 8 6	3,266 7 4	6,007 9 7 $\frac{1}{2}$	799 8 4 $\frac{1}{2}$	1,197 6 1 $\frac{1}{4}$
1902-1903	915.42	2,486 19 2	3,367 2 11	6,113 5 10 $\frac{1}{4}$	799 5 2	1,099 16 1 $\frac{1}{4}$
1903-1904	972.20	2,391 1 10	3,419 12 9	6,880 5 2 $\frac{3}{4}$	884 2 7	1,408 11 11
1904-1905	1022.26	2,142 4 10	3,470 1 11	7,618 9 3	882 7 4	1,069 3 9
1905-1906	1048.56	2,114 14 6	3,543 15 6	8,342 0 8 $\frac{1}{2}$	979 19 10 $\frac{1}{2}$	797 11 10
1906-1907	1048.74	2,230 17 7	3,672 11 10	7,535 11 0	994 15 4 $\frac{1}{2}$	1,023 19 0
1907-1908	1033.61	2,302 16 7	3,784 15 8	8,084 9 1	305 12 9	1,525 9 7
1908-1909	1050.02	2,376 6 3	3,825 10 3	8,874 4 2	426 3 4	1,212 8 5
1909-1910	1081.00	2,432 0 0	3,834 1 9	8,616 8 1 $\frac{1}{2}$	460 4 6	..
1910-1911	1137.15	2,451 6 5	3,944 3 1	9,364 13 9	369 15 9	..
1911-1912	1183.81	2,403 14 9	4,001 13 7	8,422 13 7	392 6 0	..
1912-1913	1271.94	2,449 3 2	4,048 7 9	8,445 0 10	571 2 0	..
1913-1914	1323.34	2,579 14 0	4,087 2 11	9,404 16 11 $\frac{3}{4}$	620 18 9	..
1914-1915	1386.57	2,619 0 7	4,281 11 10	9,581 1 0	1,052 10 9	..
1915-1916	1426.98	2,584 18 11	4,571 13 3	10,768 1 10	1,276 17 3	..
1916-1917	1390.76	2,521 4 2	4,794 1 7	11,093 5 6 $\frac{1}{2}$	1,116 2 5	..

TABLE NO. XVIII., *continued*

Year.	Wine, Spirits and Beer.	Surgery and Dispensary.	Funeral Ex- penses.	Tenants' Re- pairs.	Farm and Garden.	M'iscellaneous and Telephone.
	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.
1874-75	90 0 3½	85 19 1½	32 18 6	136 16 7	265 0 6	99 5 7
1875-76	74 6 6	124 6 11	44 7 0	135 13 9	297 14 2½	99 10 5½
1876-77	59 12 6	65 10 6½	36 19 4½	129 13 11½	251 18 2	68 3 4½
1877-78	34 2 9	99 9 7½	41 9 9½	134 15 6½	195 3 1½	192 16 6
1878-79	30 5 9	49 4 7	38 10 1	104 4 8	151 6 4	175 18 10
1879-80	34 11 0	76 13 2	50 1 5	122 3 0½	218 14 5½	222 13 4
1880-81	57 10 0	65 13 2½	110 19 5	122 18 0	211 15 5½	215 12 9
1881-82	48 18 6	49 10 7½	71 4 11	117 0 11	145 15 1	243 3 3
1882-83	30 7 0	32 5 1½	123 12 6	116 1 8	87 1 9½	199 18 5½
1883-84	61 4 0	68 11 8	78 3 3	129 10 9½	97 8 3½	84 11 6½
1884-85	46 18 0	25 18 4	84 10 8½	112 3 7½	122 7 10	98 8 5½
1885-86	56 16 0	30 18 11	108 3 8	125 9 3	132 0 7	112 6 7½
1886-87	56 0 0	68 10 4	52 5 10	120 12 1	122 3 10½	71 12 2
1887-88	65 13 4	67 2 7½	61 5 1½	282 0 2½	151 5 11	109 10 2
1888-89	68 14 0	104 15 7	78 5 9	151 5 8	134 8 4	206 19 9
1889-90 (6 mons.)	32 14 6	101 7 0	41 1 5	105 1 0	88 5 11	88 16 2
1890-91	40 12 0	168 9 10	66 16 0	176 3 3½	160 3 0	190 11 7½
1891-92	45 13 6	141 18 3	78 8 3	190 6 2	171 9 4	175 12 2½
1892-93	41 12 6	207 7 7	71 2 8	233 0 6½	177 14 11	187 6 4
1893-94	37 6 6	184 10 4	79 7 0	191 16 0½	177 14 3	194 12 8½
1894-95	37 2 8	195 3 4	68 5 11	239 19 2¼	194 10 8	234 16 1½
1895-96	39 7 9	197 17 10	47 11 8	238 19 3	197 18 11	235 4 9
1896-97	33 7 6	194 1 4	50 10 2½	259 7 7	219 4 9	242 16 10½
1897-98	51 0 6	238 4 2½	64 2 11	289 1 8	262 7 3¼	366 2 3½
1898-99	31 10 2½	253 15 2½	68 2 4½	164 17 3¼	153 12 11½	215 13 5¼
1899-1900	35 0 3	218 16 1	72 12 6½	144 19 2½	137 17 9	251 17 1½
1900-1901	39 1 6	133 0 2	45 0 9	163 15 7½	149 17 7	265 3 6½
1901-1902	43 0 6	210 15 0	61 17 4	147 17 7¼	145 14 8¾	254 2 4
1902-1903	44 13 0	220 11 10	46 2 5	171 10 1¾	151 0 4½	262 12 1¾
1903-1904	60 16 0	210 18 3	79 18 4	187 6 10	153 2 4½	266 15 0¾
1904-1905	42 6 6	180 14 6	73 2 2	138 5 6	88 1 2	212 15 3
1905-1906	24 18 3	271 2 6	73 5 7	180 2 5	81 17 3	217 14 1½
1906-1907	22 8 6	318 1 4	64 19 0	162 14 0	33 9 0½	198 13 5
1907-1908	36 19 6	288 18 11½	72 19 6	134 14 0	40 0 6½	362 2 11
1908-1909	23 1 3	264 14 6	72 8 0	173 3 5	27 4 4	184 1 6
1909-1910	55 19 3	255 10 11	70 14 0	80 17 0	96 11 9	213 18 3½
1910-1911	53 8 9	278 13 2	62 16 0	143 0 11	104 2 3	166 17 1
1911-1912	30 8 5	298 8 4	71 5 3	85 5 2	89 15 6	177 14 11
1912-1913	29 19 11	298 6 4	67 16 10	85 13 7	94 1 4	168 6 6
1913-1914	35 6 10	341 2 6	100 7 8	127 17 6	88 18 5	217 3 2½
1914-1915	24 11 8	273 17 9	76 15 9	91 6 4	90 0 9	124 5 5
1915-1916	16 15 0	354 8 11	87 19 0	128 2 5	67 13 1	113 4 5
1916-1917	39 18 8	524 17 6	126 17 0	143 1 3	50 11 3	150 17 11½

TABLE No. XVIII., continued

Year.	Removal of Lunatics.			Scavengery.			Furniture Public Departments.			Total Cost.			Amount of Reimbursements from contributing Patients, &c.			Cost exclusive of reimbursements from Par. Rates, &c.			Weekly Rate per Head			Admitted during the Year		
	£	s.	d.	£	s.	d.	£	s.	d.	£	s.	d.	£	s.	d.	£	s.	d.	£	s.	d.	Males.	Females.	Total.
1874-75	16	19	0	..	..	..	..	..	..	6,682	18	0	888	1	6	5,844	16	6	0	6	10 ³ / ₄	46	38	84
1875-76	4	0	0	..	..	..	..	..	..	6,671	15	1 ¹ / ₂	752	1	6	5,919	13	7 ¹ / ₂	0	6	11 ³ / ₄	58	43	101
1876-77	17	12	8	..	..	..	..	..	..	6,473	11	5 ¹ / ₂	827	5	0	5,646	6	5 ¹ / ₂	0	6	3 ¹ / ₄	69	43	112
1877-78	19	0	3	..	..	..	..	..	..	6,774	6	4 ¹ / ₂	764	18	10	6,009	7	6 ¹ / ₂	0	6	4 ¹ / ₄	54	49	103
1878-79	11	0	6	..	..	..	..	..	..	7,004	8	11	159	12	10	6,844	16	1	0	7	2 ¹ / ₂	53	51	104
1879-80	14	2	10	..	..	..	..	..	..	7,007	0	10 ¹ / ₂	168	7	8	6,908	13	2 ¹ / ₂	0	6	11	56	59	115
1880-81	30	9	8	..	..	..	..	..	..	7,251	9	2	191	7	2	7,060	2	0	0	7	4	65	42	107
1881-82	26	9	6	..	..	..	..	..	..	6,846	13	2 ¹ / ₂	134	16	1	6,711	17	1 ¹ / ₂	0	7	2	42	56	98
1882-83	25	10	4	..	..	..	..	..	..	7,061	16	9 ¹ / ₂	189	14	5	6,872	2	4 ¹ / ₂	0	7	2 ³ / ₄	73	68	141
1883-84	24	13	0	..	..	..	..	..	..	6,935	14	2 ¹ / ₂	208	6	2	6,727	8	0 ¹ / ₂	0	6	5 ³ / ₄	80	59	139
1884-85	19	10	0	..	..	..	..	..	..	6,871	12	6	252	13	2	6,618	19	4	0	6	4	56	64	120
1885-86	28	18	1	..	..	..	..	..	..	7,027	7	3	376	6	9	6,651	0	6	0	6	8	69	70	139
1886-87	30	11	0	..	..	..	..	..	..	7,067	10	4 ¹ / ₂	415	15	7	6,651	14	9 ¹ / ₂	0	6	3 ¹ / ₄	79	62	141
1887-88	24	2	9	..	..	..	..	..	..	7,700	5	6	365	4	7	7,345	0	11	0	7	0	78	71	149
1888-89	15	4	9	..	..	..	..	..	..	8,781	14	0	391	0	6	8,390	13	6	0	7	4	92	69	161
1889-90 (6 mos.)	10	9	0	..	..	..	..	..	..	4,755	14	0	151	13	5	4,604	0	7	0	7	7	35	42	82
1890-91	22	1	0	..	..	..	..	..	..	10,093	10	7 ¹ / ₂	301	10	0	9,792	0	7 ¹ / ₂	0	7	7	93	79	172
1891-92	25	3	6	207	5	0	..	..	..	11,578	17	2 ¹ / ₂	471	6	10	11,107	10	4 ¹ / ₂	0	7	8 ¹ / ₄	80	106	186
1892-93	19	3	6	195	12	8	261	0	4	11,453	1	3 ¹ / ₂	532	6	0	10,920	15	3 ³ / ₄	0	7	7	78	80	158
1893-94	8	7	9	192	19	0	62	0	6	11,280	18	1	492	16	4	10,788	1	9	0	7	2	75	78	153
1894-95	19	6	6	193	9	4 ¹ / ₂	49	5	0	11,648	15	6 ¹ / ₂	384	2	8	11,264	12	10 ¹ / ₂	0	7	3 ¹ / ₄	84	85	169
1895-96	27	7	6	192	0	2	47	8	11	11,867	3	1	418	13	6	11,448	9	7 ¹ / ₂	0	6	10 ¹ / ₂	90	84	174
1896-97	27	12	0	208	4	0	50	0	0	12,901	18	4 ¹ / ₂	458	15	2	12,443	3	2 ¹ / ₂	0	6	10 ¹ / ₂	81	106	187
1897-98	19	0	3	199	11	1	99	14	2	14,061	12	9	532	18	9	13,528	13	1	0	6	10	109	95	204
1898-99	39	10	9	126	0	11	..	..	..	13,651	4	1	359	10	8	13,291	13	5	0	6	7	88	80	168
1899-1900	24	13	6	104	5	3	..	..	..	13,559	10	1	454	9	1	1,305	1	0	0	6	4	96	93	189
1900-1901	26	4	3	116	12	7	163	0	4	14,445	3	2 ¹ / ₂	525	8	5	13,919	14	9 ¹ / ₂	0	6	4	104	96	200
1901-1902	29	5	9	115	12	6	42	12	0	14,759	17	8	547	3	10 ¹ / ₂	14,212	13	9 ¹ / ₂	0	6	4	99	83	182
1902-1903	22	6	9	111	10	5	94	12	11	15,029	0	6	517	18	1 ¹ / ₂	14,511	2	4 ¹ / ₂	0	6	1	118	108	226
1903-1904	17	5	9	22	0	5	35	10	6	16,017	7	10	406	6	2	15,611	1	8	0	6	2	105	101	206
1904-1905	19	18	0	17	17	1	50	18	0	16,006	5	3	449	9	2	15,557	12	10	0	5	10	124	116	240
1905-1906	30	11	3	3	18	0	190	17	10	16,852	9	7 ¹ / ₂	631	19	11 ¹ / ₂	16,220	9	8	0	5	11	134	96	230
1906-1907	35	18	3	..	..	..	4	19	6	16,298	17	10	654	4	3 ¹ / ₂	15,644	13	0 ¹ / ₂	0	5	10	10	125	234
1907-1908	30	12	9	2	16	3	..	..	..	17,078	8	3	474	1	3	15,604	7	0	0	6	3 ¹ / ₄	148	131	279
1908-1909	22	11	0	1	11	8	..	..	..	17,786	8	11	633	5	10 ¹ / ₂	17,153	3	0 ¹ / ₂	0	6	5	114	123	237
1909-1 10	22	2	3	0	12	6	70	2	1	17,453	7	7 ³ / ₄	459	16	1	16,993	11	6 ¹ / ₄	0	6	1 ¹ / ₂	139	123	262
1910-1911	39	6	4	..	..	..	68	15	1	19,131	15	7	723	3	3 ¹ / ₄	18,408	12	3 ³ / ₄	0	6	0	164	160	324
1911-1912	31	15	10	1	18	3	133	7	8	17,797	1	2	866	11	8 ³ / ₄	16,930	9	5 ¹ / ₄	0	5	5 ¹ / ₄	138	130	268
1912-1913	30	1	7	5	14	2	213	12	4	18,414	4	1	889	13	3	17,524	10	10	0	5	4	160	189	349
1913-1914	49	0	11	3	6	11	47	6	1	19,613	14	8 ¹ / ₄	1103	1	9 ¹ / ₄	18,510	12	11	0	5	4 ¹ / ₂	162	156	318
1914-1915	37	16	8	0	16	0	64	18	10	20,336	18	10	1166	13	4 ¹ / ₄	19,170	5	5 ¹ / ₄	..	..	..	158	171	329
1915-1916	40	0	7	1	7	0	51	13	5	22,946	9	6	1357	0	9	21,589	8	9	..	..	..	192	141	333
1916-1917	39	12	5	0	8	0	48	12	3	24,318	8	6	..	..	..	..	..	..	..	..	..	155	131	286

Year.	Lighting.			Clothing and bedding.			Equipment			Conveyance of Lunatics.		
	£	s.	d.	£	s.	d.	£	s.	d.	£	s.	d.
1907-1908	166	9	2	..	..	..	..	..	..	..	..	..
1908-1909	303	0	10	..	..	..	..	..	..	..	..	..
1909-1 10	311	11	8	79	1	6 ³ / ₄	141	12	0	..	..	..
1910-1911	463	13	4	1,261	8	8	259	9	0	..	..	..
1911-19 2	43	9	9	1,079	15	4	153	8	10	..	..	..
1912-1913	399	13	9	1,351	0	6	171	3	6	..	..	..
1913-1914	386	7	2	1,310	9	4	213	15	6	..	..	..
1914-1915	338	2	3	1,447	6	11	232	15	4	..	..	..
1915-1916	338	18	8	1,817	7	5	193	14	7	533	13	9
1916-1917	318	1	10	2,188	14	6	238	3	9	393	2	3

LEPERS' HOME.

Report for the year ended 31st March, 1917.

Jamaica Leper Asylum, 31st May, 1917

Sir,

I have the honour to submit my Annual Report for the financial year ended 31st March, 1917.

1. *The Staff*.—It gives me much pleasure to report that the several duties were discharged in a very satisfactory manner.

Mr. Levy, the Superintendent, and Miss McPherson, the Matron, are capable officers and rendered me valuable assistance in carrying out my duties.

2. *Discipline*.—The conduct of the inmates has been good, trivial breaches of the rules have always been dealt with.

3. *Occupation*.—The male and female inmates have as heretofore, been engaged in the usual duties connected with the home.

The Farm produce supplied by the male inmates was 10,331 pounds of potatoes, 1,667 pounds peas, 2,274 pounds vegetables and 198 pounds of Herbs for tea.

The total amount paid the inmates was £88 4s. 4d.

4. *Gifts*.—I have to thank those ladies and gentlemen who have generously contributed to the pleasures of the inmates during the festive seasons.

5. *Buildings and grounds*.—The buildings have been kept in fair order, the grounds are kept clean and sanitary.

6. *Religious Ministrations*.—As in former years the Anglican and Roman Catholic bodies give special attention to the spiritual wants of the inmates.

I very much regret that Miss McGlashan the Lady Visitor, who has for years carried on such good work at the home is in failing health, nevertheless she continues to do what she can for the benefit of the inmates.

7. *Statistics*.—There were twenty admissions, two being re-admissions.

The greatest number at any time (30/3/17), was 122. The least number at any time (9/8/16) was 112. The daily average was 116, made up of 5 coolies and 111 creoles. The death rate was 7.8%

8. *Maintenance*.—£9. 17s. 3d., per inmate per annum. The daily average cost was 6½d. per inmate.

9. *Treatment*.—I regret that owing to the present war "Antileprol" was not procurable and I have had to use Chaulmoogra Oil.

Improvements have always been observed soon after the admission of an inmate, due to better hygienic conditions, good food and nursing; and under Antileprol treatment, there has always been a diminution of the lesions. The Macular show signs of fading and sensation gradually returns, the nodules getting absorbed.

As I mentioned in my last report the drug Antileprol has a marked influence in checking the progress of the disease and restoring vigor to the wasted tissues.

I have, etc.,

J HUNTER PECK,
Acting Medical Attendant.

The Hon. Suptg. Medical Officer,
Kingston.

Jamaica Leper Asylum, Spanish Town.
TABLE No.1.—Return General Statistics for 1916-1917.

			Males.	Females.	Total.	Remarks.
Remaining in Asylum 31.3.16	..	..	69	52	121	Death rate
Admitted during 1916-1917	..	..	11	9	20	per
Discharged 1916-1917	..	..	2	4	6	centum
Absconded 1916-1917 ..	..	..	2	..	2	7.8
Died 1916-1917 ..	..	..	8	3	11	
Remaining in Asylum 31.3.1917	..	..	68	54	122	

TABLE NO. II.—Comparative Statistics from 1st October, 1887, to 31st March, 1916.

Year.	Admissions.		Discharges.		Deaths.		Remaining at end of Year.		Death rate per 100.	Re-admission of Lepers.
	Lepers.	Non-Lepers	Lepers.	Non-Lepers.	Lepers.	Non-Lepers	Lepers	Non-Lepers.		
1878-79	26	39	2	40	10	3	40	31	10.31	..
1879-80	26	43	8	31	7	..	51	33	5.	..
1880-81	39	101	16	72	11	4	63	58	6.69	..
1881-82	38	115	23	107	13	5	65	61	6.50	..
1882-83	40	85	22	96	8	3	75	47	4.38	..
1883-84	30	71	26	63	9	3	70	52	5.38	..
1884-85	33	87	18	80	14	..	71	59	5.78	..
1885-86	39	131	17	114	16	2	77	74	6.	..
1886-87	25	141	17	130	16	6	69	79	6.94	..
1887-88	32	8	..	19	23	8	78	60	16.48	..
188 -89	31	93	4	98	11	6	94	49	6.48	..
Oct. '89 to March '90	9	22	6	35	12	2	82	37	8.04	..
1890-91	34	67	15	88	15	2	86	14	7.74	..
1891-92	38	2	8	9	15	2	106	5	12.16	..
1892-93	26	1	16	4	1	..	100	2	8.27	..
1893-94	23	2	24	3	20	..	79	1	15.74	7
1894-95	26	1	12	..	18	..	76	2	16.82	14
1895-96	37	2	8	4	10	..	94	..	8.62	10
1896-97	40	2	11	2	16	1	106	..	12.5	9
1897-98	38	1	3	2	13	..	127	..	8.96	3
1898-99	20	2	8	3	20	..	118	..	13.6	5
1899-1900	27	3	3	2	20	..	122	1	13.5	6
1900-01	19	3	6	2	15	..	120	2	10.3	1
1901-02	9	1	4	..	14	2	110	2	11.4	2
1902-03	19	..	2	2	17	..	108	2	13.	3
1903-04	33	3	5	3	20	..	117	1	13.7	1
1904-05	25	..	5	..	23	..	114	1	16.1	2
1905-06	19	..	3	..	14	..	115	1	10.4	3
1906-07	14	..	1	..	15	..	113	1	11.62	1
1907-08	12	..	5	1	14	..	105	..	11.1	..
1908-09	24	..	..	1	15	..	112	1	11.6	4
1909-10	12	1	7	..	10	6	102	2	12.27	..
1910-11	24	..	6	1	15	1	103	1	12.6	4
1911-12	25	1	5	1	10	..	113	1	7.7	1
1912-13	12	2	2	1	14	..	109	2	10.9	2
1913-14	21	1	5	..	8	..	117	3	6.	..
1914-15	19	2	12	1	9	1	115	3	7.	..
1915-16	29	1	10	1	16	..	118	3	10.8	6
1916-17	20	..	8	..	11	..	119	3	7.8	2

TABLE No. III.—Return of Admissions for 1916-1917.

No.	Name.	Age. Years.		Form of Leprosy.	Years afflicted.	If re- admitted.	Country.	Late Residence.	Date of Admission
		M.	F.						
1	E. Fol.	14	30	Mixed	8	No	Jamaica	St. Mary	19.4.16
2	E. "	15	40	T.	5	"	"	St. Thomas	5.5.16
3	E. "	16	40	T.	1	"	"	Clarendon	30.5.16
4	D. "	176	45	T.	1	Yes	"	Manchester	11.6.16
5	E. "	17	34	A.	1	No	"	St. Andrew	11.8.16
6	E. "	18	18	A.	3	"	India	Portland	11.8.16
7	E. "	19	14	T.	3	"	Jamaica	Hanover	26.8.16
8	E. "	20	29	T.	10	"	Jamaica	Kingston	5.9.16
9	E. "	21	70	A.	25	"	Cuba	Kingston	19.9.16
10	E. "	23	39	A.	1	"	Jamaica	St. James	7.11.16
11	E. "	25	34	T.	1	"	India	St. Thomas	29.12.16
12	E. "	26	40	T.	3	"	Jamaica	St. Elizabeth	16.1.17
13	E. "	29	30	A.	5	"	"	Portland	1.2.17
14	E. "	30	56	T.	5	"	"	St. Catherine	19.2.17
15	E. "	31	30	? T.	2	"	"	St. James	28.2.17
16	E. "	32	32	A.	2	"	"	St. Mary	2.3.17
17	E. "	33	49	? Leprosy	10	"	"	St. Catherine	3.3.17
18	E. "	34	30	A.	4	Yes	India	St. Mary	24.3.17
19	E. "	35	3	A.	3	No	Jamaica	St. Catherine	29.3.17
20	E. "	36	30	A.	7	"	"	"	30.3.17

TABLE No. IV.—Birthplaces of those admitted, 1916-1917

Birthplace.	Male.	Female.	Total.
Portland ..	1	1	2
Manchester ..	1	1	2
Clarendon ..	..	1	1
St. Andrew ..	1	..	1
India ..	2	1	3
Hanover ..	1	..	1
Trelawny ..	1	..	1
Cuba ..	..	1	1
St. James ..	2	1	3
St. Elizabeth ..	..	1	1
St. Mary ..	..	1	1
St. Catherine ..	2	1	3
	11	9	20

TABLE No. V.—Return of Discharged, 1916-1917.

No.	Name	Age. Years.		Date of Admission.	Date of Discharge.	Total Years. Afflicted.	Form of Leprosy	Remarks.
		M.	F.					
1	A. C.	26	..	14.1.1915	15.7.1916	3½	T.	Law 15 of 1896, Sec. 9
2	W. F.	32	..	23.1.1896	18.7.191	21	A.	do. do.
3	W. Fr.	7	..	15.5. 915	6.8.1916	8¼	A.	Absconded.
4	L. R.	..	34	7.4.1913	4.9.1916	4	A.	Law 15 of 1896, Sec. 9.
5	E. L.	..	40	2.12.14	6.9.1916	4	A.	do. do.
6	V. N.	..	16	30.5.1912	15.9.16	5	T.	do. do.
7	P. W.	..	35	2.5.191	1.1.191	10	A.	do. do.
8	R. L.	35	..	29.12.1916	3.3.1917	1	?T.	Absconded

TABLE No. VI.—Birthplaces of those discharged, 1916-1917.

Birthp'ace.	Male.	Female.	Total.	Remarks.
Trelawny ..	1	..	1	
China ..	1	..	1	
India ..	1	..	1	
Clarendon ..	1	1	2	
Manchester ..	..	2	2	
Kingston ..	..	1	1	
	4	4	8	

TABLE No. VII.—Return of Deaths for 1916-1917.

No.	Name.	Years.		Country.	Date of Admission	Date of Death	Form of Leprosy.	Total Years afflicted	Cause of Death.
		M.	F.						
1	R. D.	..	42	Jamaica	20.6.1914	13.4.1916	T.	6	Val. Disease of the Heart
2	J. B.	23	..	"	21.5.1910	19.4.1916	T.	6½	Mal. Feb. Remit.
3	A. A.	33	..	"	12.12.1905	23.4.1916	T.	18	Pul. Tuber.
4	W. D.	46	..	"	9.10.1908	6.5.1916	T.	8	Chr. Diarrhœa.
5	R. W.	39	..	"	20.5.1905	7.5.1916	A.	13	Mal. Feb. Remit.
6	R. M.	..	51	"	4.4.1905	26.5.1916	A.	13	Dysentery.
7	J. D.	47	..	"	14.11.1911	24.6.1916	T.	9½	Pul. Tuber.
8	C. T.	44	..	"	26.3.1911	8.10.1916	T.	15	do.
9	A. S.	..	40	"	12.6.1894	3.1.1917	Mixed	23	do.
10	D. W.	29	..	"	9.11.1911	15.1.1917	T.	8¼	do.
11	E. B.	73	..	"	25.11.1914	21.2.1917	T.	4¼	do.

Average longevity of the Disease in those who died.

Anaesthetic	Males	13 years.
"	Females	13 "
Tubercular	Males	9½ "
"	Females	6 "
Mixed	Males	Nil
"	Females	23 "

General Death rate 7.8 per 100.

TABLE No. VIII.—Return of Birthplaces of Deceased, 1916-1917.

Birthplace.	Male.	Female.	Total.
St. Catherine ..	..	2	2
St. Ann ..	1	..	1
Manchester ..	2	1	3
Kingston ..	1	..	1
St. Elizabeth ..	2	..	2
St. James ..	1	..	1
Clarendon ..	1	..	1
	8	3	11

TABLE IX.—Chief Intercurrent Diseases treated during 1916-1917.

Diseases of the Digestive System.—Diarrhoea, indigestion, constipation: were the chief under this head treated, due largely to a generous diet, and "Camp cooking" in their farm lots.

Urinary System.—Nephritis more marked in cases of Tubercular Leprosy.

General Diseases.—Six cases of Pul. Tuberculosis, all in Tubercular or Mixed Leprosy.

